



# ULTRA-TEC®

## SWAGELESS CABLE RAILING SYSTEM

[bezdanultratec.com](http://bezdanultratec.com)

### Selection • Value Do-It-Yourself

Ultra-tec® is the preeminent line of cable railing systems in North America offering a great selection of do-it-yourself swageless cable rail assemblies for wood or metal railing frames used indoors and out.

Sold in kit form, the marine grade type 316 stainless steel cable in 1x19 construction is available in 1/8" diameter and includes everything you need for level installation. Instructions are included and there is no need to order any extras.

A comprehensive range of fittings including those for 3/16" and 1/4" cable are also available by special order.

### SWAGELESS FITTINGS OFFER MANY BENEFITS

**Feature:** Swageless fittings are installed on cables by hand at the job site.

**Benefit:** No special equipment is required.

**Feature:** At least one cable end does not contain a fitting when delivered to the job site.

**Benefit:** Cable can easily be fed through the intermediate posts and end posts.

**Feature:** Cables can be installed at the same time the railing frames are installed.

**Benefit:** No time lost at the estimating stage determining exact measurements, unlike that which is required for swaged fittings.

**Feature:** No costly swaging equipment is required.

**Benefit:** Faster installation = cost savings.



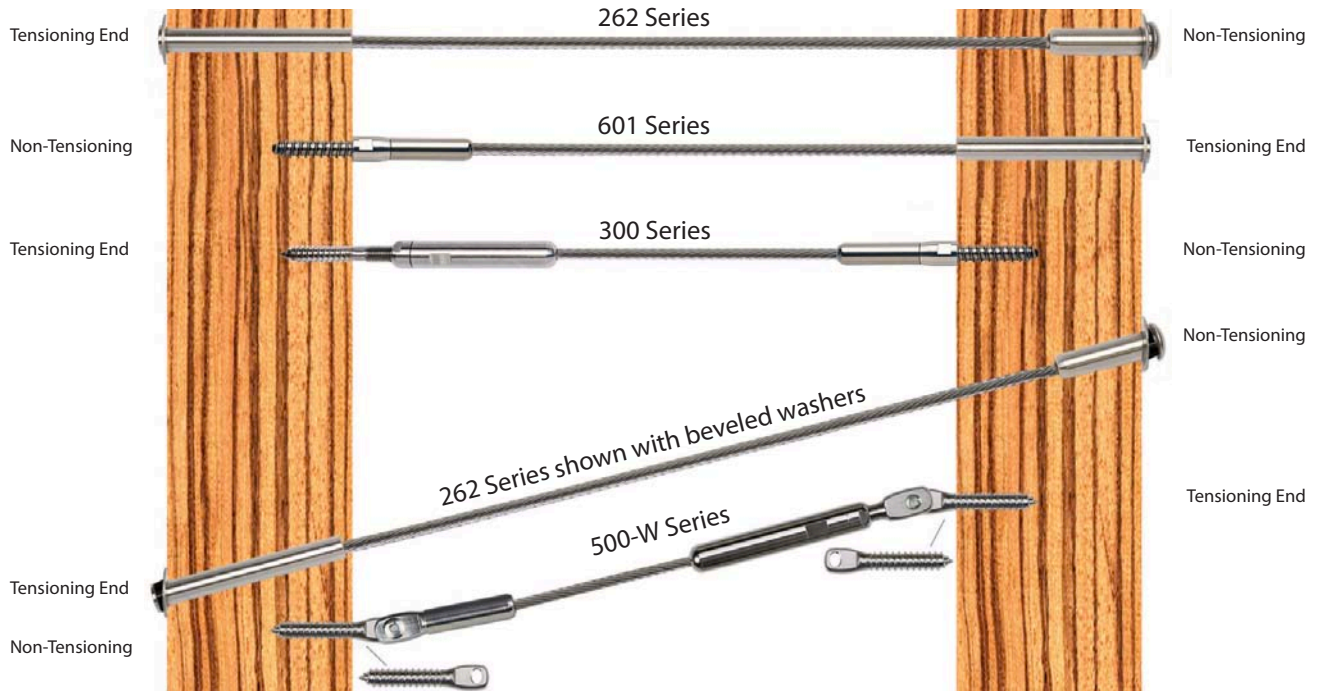
Figure 1: 200 Series







## Kits for Wooden Posts



Installation instructions for each kit are available at [bezdanultratec.com](http://bezdanultratec.com) and on pages 12 to 16.

Kit	262 Series	601 Series	300 and 500-W Series
<b>Application</b>	Outside-to-Outside of Post up to 50'	Inside-to-Outside of Post up to 50'	Inside-to-Inside of Post up to 50'
<b>Post Access</b>	For use with end posts that are not obstructed	For use where one end post is obstructed preventing the cable from being pulled through the post	For use with end posts that are either obstructed or not obstructed
<b>End Caps</b>	Only the end caps are visible	End cap on one end is visible	No end caps so post face is clean
<b>Fittings</b>	Uses 3-1/2" long Invisiware® receiver (tensioning end) and Pull-Lock™ (non-tensioning)	Uses 3-1/2" long Invisiware® receiver (tensioning end) and Push-Lock™ lag (non-tensioning)	Uses Adjust-a-Body® with hanger bolt (tensioning end) and Push-Lock™ lag (non-tensioning)
<b>Angle (Stairs)</b>	Requires beveled washers	Not intended for angled applications	500-W intended for angled applications
<b>Features</b>	Tamper proof	Tamper proof	Tamper proof

### More sizes available

Other cable diameters and a comprehensive range of fittings available by special order. Please contact us for more information.



### New! Cable Clips

Use the Cable Clip to add infill railing panels to the 262 Series! For product information see page 26.

## Kits for Wooden Posts

### 262 Series: Outside-to-Outside of Post

#### 262 SERIES KIT

The most economical solution for straight runs.

This kit includes cable and all necessary components for level installations.

- Tensioning device:  
3-1/2" long Invisiware® receiver
- Non-tensioning device:  
Pull-Lock™ fitting

Part #	Cable Length	INDOOR	OUTDOOR
		Cable Size	Weight
26205	5'	1/8"	0.37 lbs.
26210	10'	1/8"	0.55 lbs.
26215	15'	1/8"	0.72 lbs.
26220	20'	1/8"	0.89 lbs.
26225	25'	1/8"	1.07 lbs.
26230	30'	1/8"	1.24 lbs.
26240	40'	1/8"	1.59 lbs.
26250	50'	1/8"	1.94 lbs.

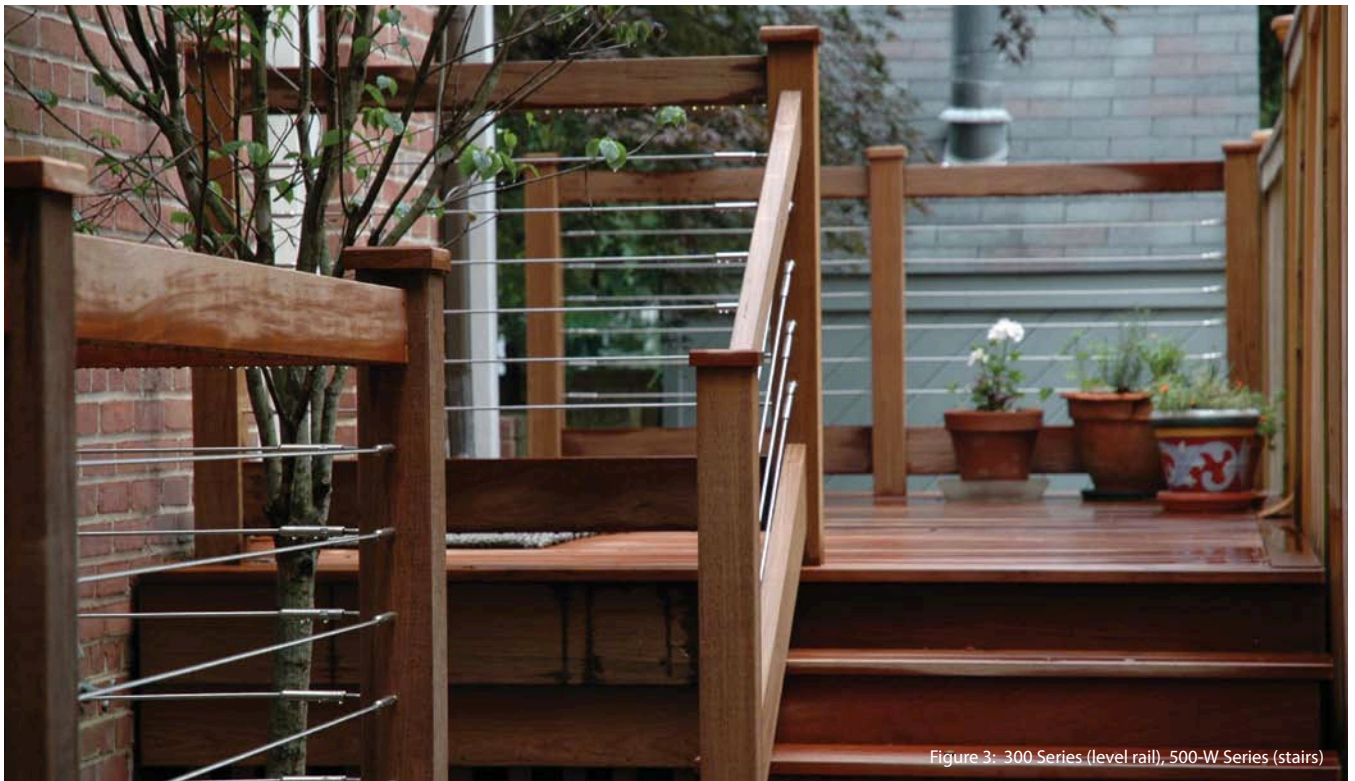
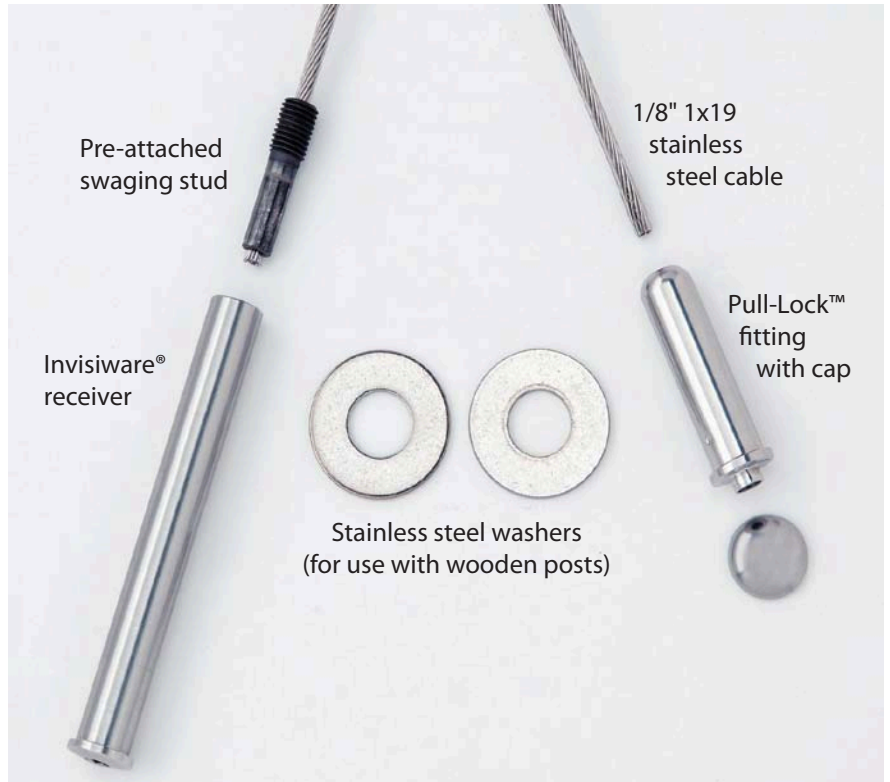


Figure 3: 300 Series (level rail), 500-W Series (stairs)

## Kits for Wooden Posts 262 Series: Applications

### INSTALLATION REQUIREMENTS

- Dedicated end post for each run
- Minimum 3-1/2" access to the backside of one post for each run

#### Straight Runs Terminating at Post

Typical installation layout

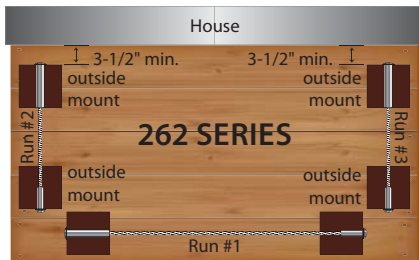


Illustration 1

Note: If your deck has only one post at each corner instead of two (as shown) you can also use 300 Series (Inside-to-Inside of Post) for Run #1.

#### Straight Runs With One Corner

Typical installation layout

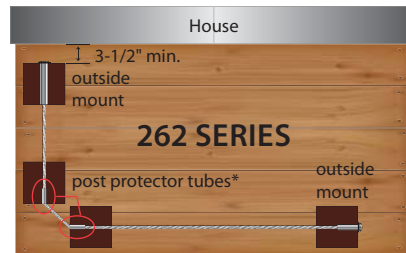


Illustration 2

\* Post protector tubes are required when installing cable on a corner bend. Sold separately. See page 26.

Additional installation requirements for this application:

- Corner bend does not exceed 45° at any one time
- Post protector tubes\*

#### Straight Runs On An Angle (Stairs)

Typical installation layout

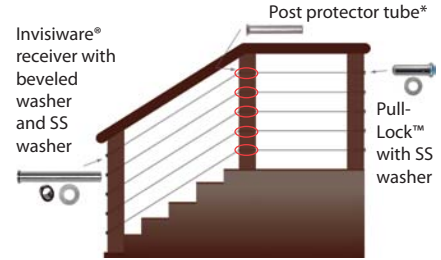


Illustration 3

\* Post protector tubes are required when installing cable on an angled bend. Sold separately. See page 26.

Additional installation requirements for this application:

- Beveled washers (see page 26)

## Angled Runs Terminating at Post

When the 262 Series is installed for an angled run a larger diameter washer is needed to distribute the load over a wider surface for both the receiver and Pull-Lock™ fittings. Order stainless steel washer 1/2SAE on page 26.



**New!**  
**Cable Clips**

Use the Cable Clip to add infill railing panels to the 262 Series! See page 26.

## The Bezdán Ultra-tec® Warranty

Stainless steel hardware and cable are covered by a limited warranty for a period of ten (10) years from the date of receipt to be free from defects due to defective materials and workmanship.

For complete warranty details, please visit [bezdanultratec.com](http://bezdanultratec.com).

## Straight Runs With Two Corners

For installations requiring two corner posts enquire about the 272 Series available by special order.



# Kits for Wooden Posts

## 601 Series: Inside-to-Outside of Post

### 601 SERIES KIT

Use when fittings are required on both inside and outside of post.

This kit includes cable and all necessary components for installation.

- Tensioning device: 3-1/2" long Invisiware® receiver
- Non-tensioning device: Push-Lock™ lag

Part #	Cable Length	INDOOR	OUTDOOR
		Cable Size	Weight
60105	5'	1/8"	0.42 lbs.
60110	10'	1/8"	0.60 lbs.
60115	15'	1/8"	0.77 lbs.
60120	20'	1/8"	0.95 lbs.
60125	25'	1/8"	1.12 lbs.
60130	30'	1/8"	1.30 lbs.
60140	40'	1/8"	1.64 lbs.
60150	50'	1/8"	2.00 lbs.

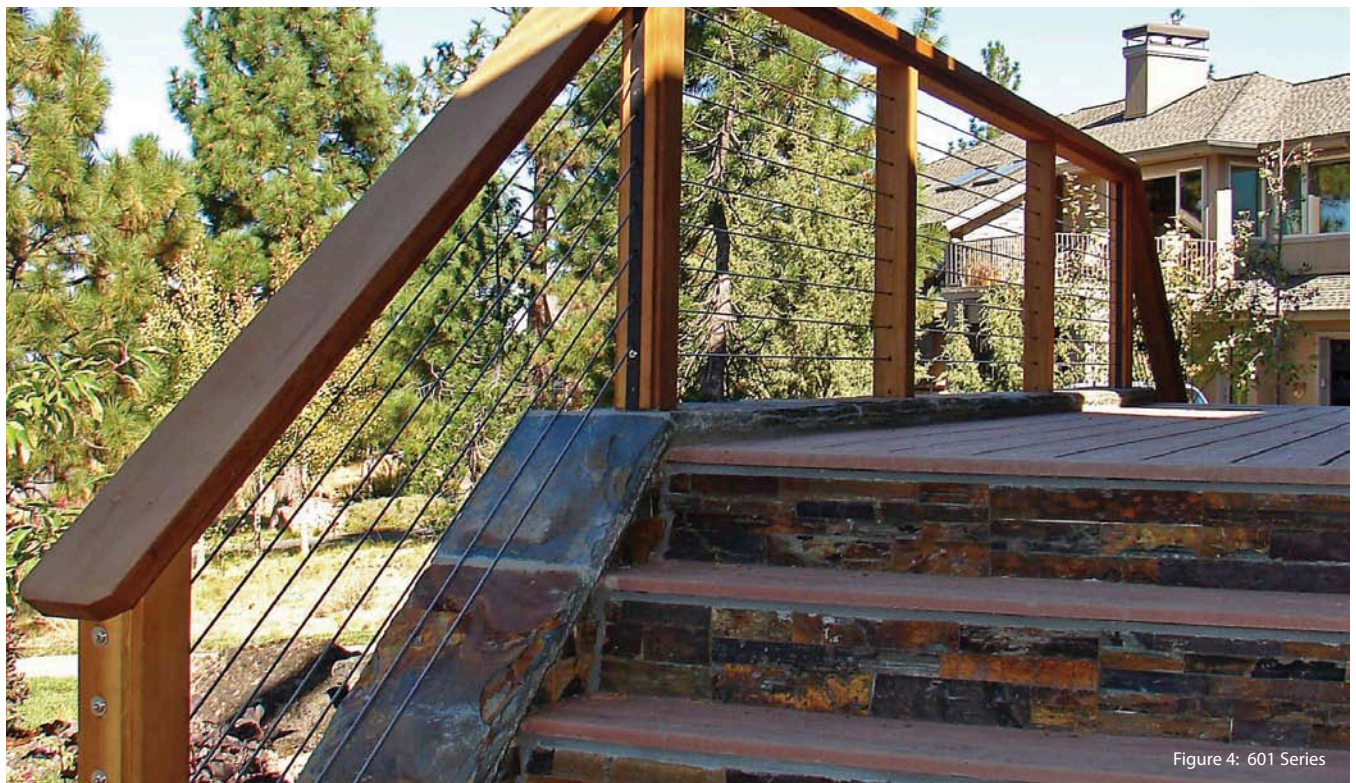
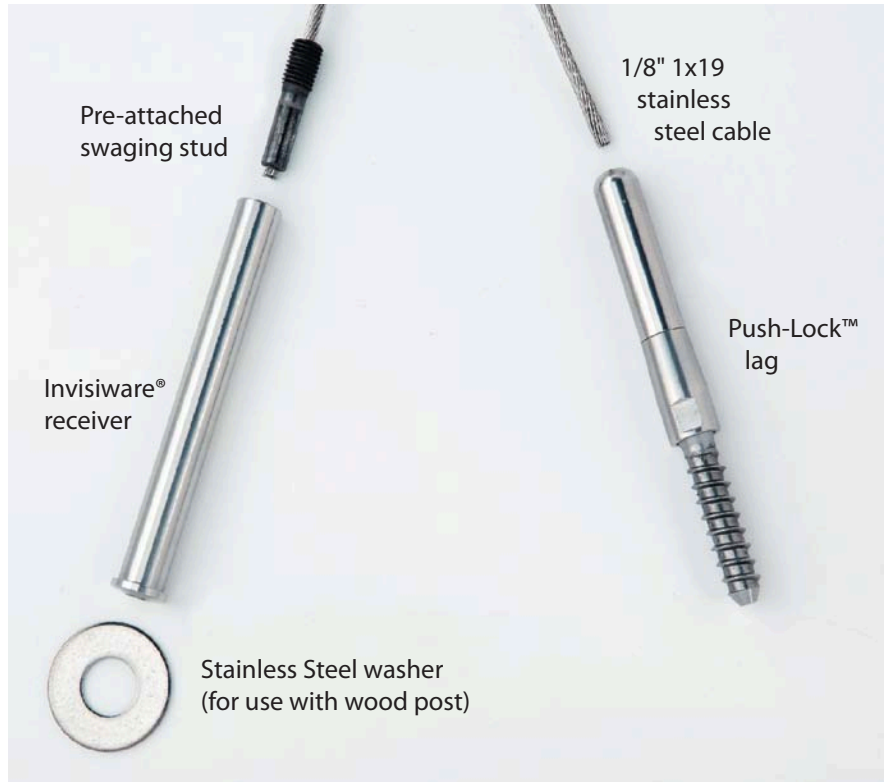


Figure 4: 601 Series

# Kits for Wooden Posts 601 Series: Applications

## INSTALLATION REQUIREMENTS

- Dedicated end post for each run
- Minimum 3-1/2" access to the backside of one post for each run

### Straight Runs Terminating at Post

Typical installation layout



Illustration 4

Note: If your deck has one post at each corner instead of two (as shown) you can also use 300 Series (Inside-to-Inside of Post) for Run #1. See page 12, "Posts for Intersecting Runs".

### Straight Runs Terminating at Post

Alternate installation layout



Illustration 5

Run #1: Use 262 (as shown), 300 or 601 Series. For more information, see page 12, "Posts for Intersecting Runs".

### Straight Runs With One Corner

Typical installation layout



Illustration 6

\* Post protector tubes are required when installing cable on a corner bend. Sold separately. See page 26.

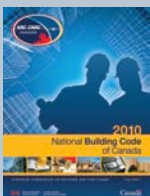
Additional installation requirements for this application:

- Corner bend does not exceed 45° at any one time
- Post protector tubes\*

## Straight Runs With Two Corners

For installations requiring two corner posts, enquire about the 672 Series available by special order.

## Building Code Information



This product information is not intended for use as a recommendation for using or installing cable rail. It is the customer's responsibility to ensure compliance with local, provincial or national building codes. Always consult with your local building department before starting your project. Information about the 2010 National Building Code can be found in "Resources" or at bezdanultratec.com.

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## Kits for Wooden Posts 300 Series: Inside-to-Inside of Post

### 300 SERIES KIT

For inside mount installation only or where no visible end cap is desired.

This kit includes cable and all necessary components for installation.

- Tensioning device: Adjust-a-Body® with hanger bolt
- Non-tensioning device: Push-Lock™ lag

Part #	Cable Length	INDOOR	OUTDOOR
		Cable Size	Weight
30005	5'	1/8"	0.47 lbs.
30010	10'	1/8"	0.64 lbs.
30015	15'	1/8"	0.82 lbs.
30020	20'	1/8"	0.99 lbs.
30025	25'	1/8"	1.17 lbs.
30030	30'	1/8"	1.34 lbs.
30040	40'	1/8"	1.69 lbs.
30050	50'	1/8"	2.04 lbs.

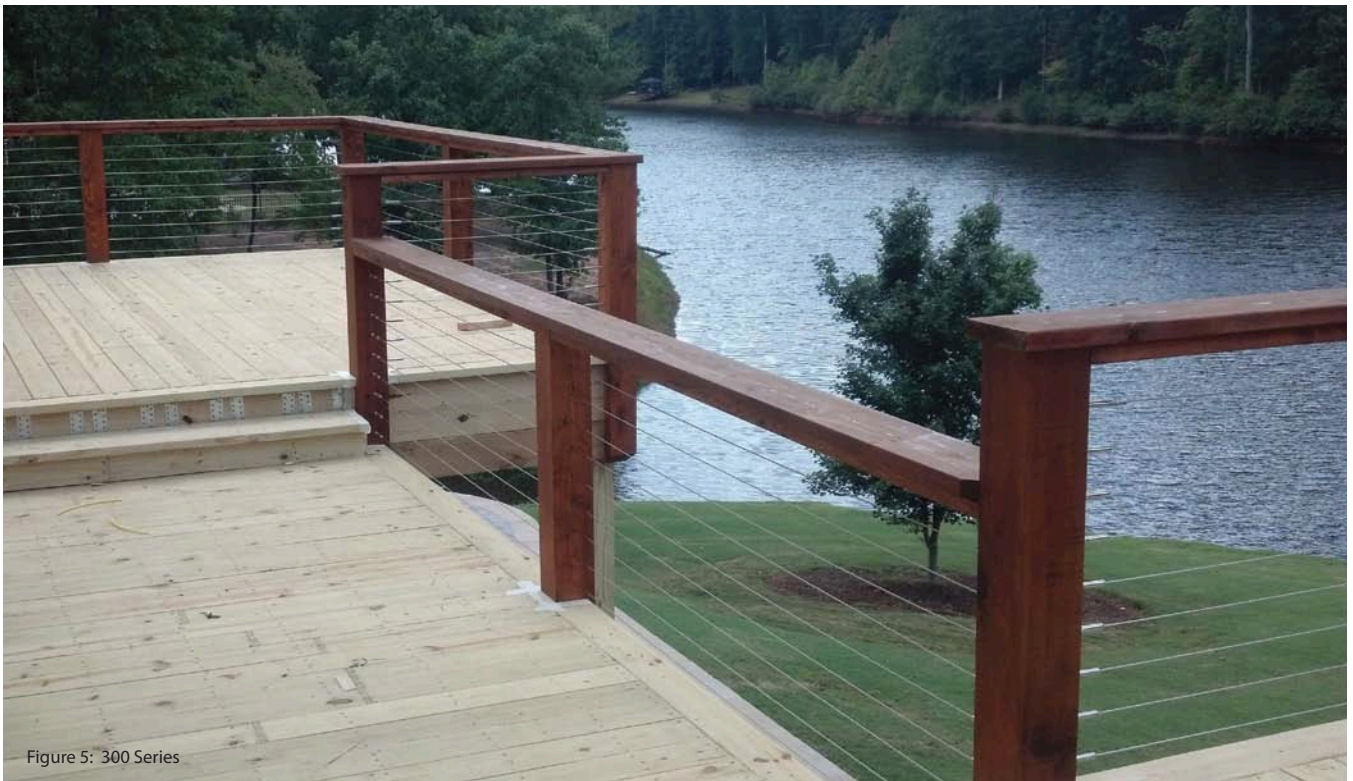


Figure 5: 300 Series



# Kits for Wooden Posts 300 Series: Applications

## INSTALLATION REQUIREMENTS

- Dedicated end post for each run

### Straight Runs Terminating at Post

Typical installation layout



Illustration 7

\* Run #1: Use Series 262 (shown) or Series 300. For more information, see "Posts for Intersecting Runs," page 12.

### Straight Runs With One Corner

Typical installation layout

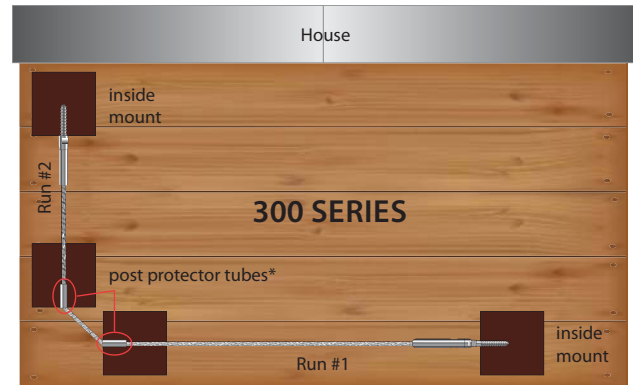


Illustration 8

\* Note: Post protector tubes are required when installing cable on a corner bend. Sold separately. See page 26.

Additional installation requirements for this application:

- Corner bend does not exceed 45° at any one time
- Post protector tubes\*

## Straight Runs With Two Corners

For installations requiring two corner bends enquire about the 371 Series available by special order. Contact your Sales Representative for more information.



Figure 6: 300 Series

## Kits for Wooden Posts 500-W Series: Inside-to-Inside of Post

### 500-W SERIES KIT

For sloped applications where drilling through post is undesirable.

This kit includes cable and all necessary components for installation.

- Tensioning device: Adjust-a-Body® with threaded eye
- Non-tensioning device: Push-Lock™ with threaded eye

Part #	Cable Length	INDOOR	OUTDOOR
		Cable Size	Weight
50005-W	5'	1/8"	0.49 lbs.
50010-W	10'	1/8"	0.67 lbs.
50015-W	15'	1/8"	0.84 lbs.
50020-W	20'	1/8"	1.02 lbs.
50025-W	25'	1/8"	1.19 lbs.
50030-W	30'	1/8"	1.38 lbs.
50040-W	40'	1/8"	1.71 lbs.
50050-W	50'	1/8"	2.06 lbs.

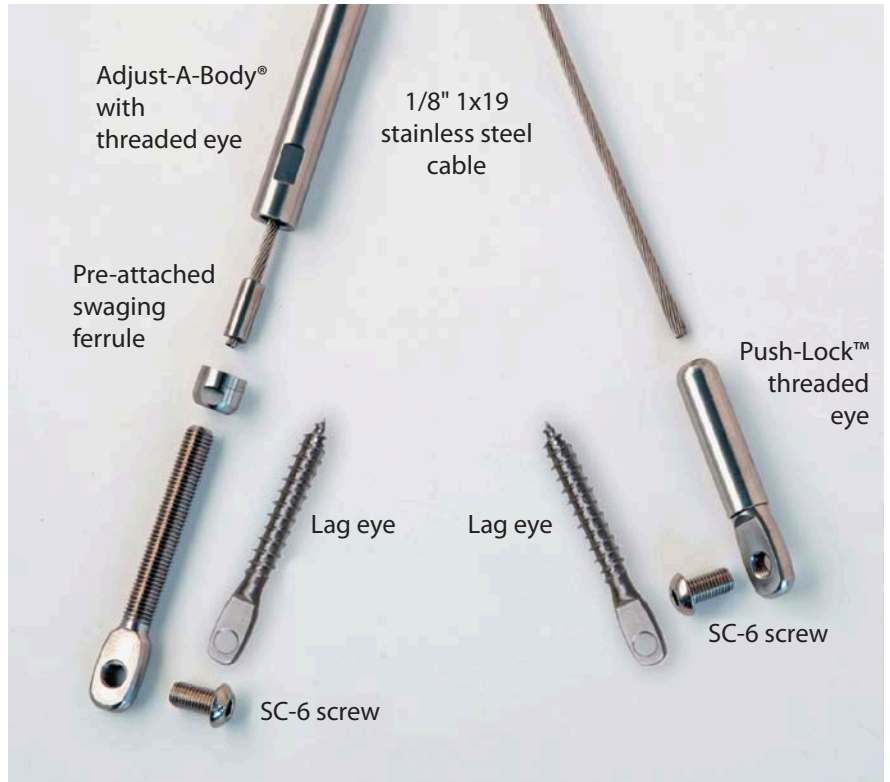


Figure 7: 300 Series (level rail), 500-W Series (stairs)



## Kits for Wooden Posts 500-W Series: Applications

### CABLE RUNS ON A PITCH

Top posts are often corner posts which may require the stair run to connect to the inside of the post. The top and bottom of the cable run would be connected perpendicular to those posts, and only intermediate posts would be drilled on the angle for the cable to run through.

The 500-W Series can be used to go up a stair and across a landing by inserting post protector tubes\* in the break-over post (see Illustration 9). The tubes will prevent the cable from carving a groove into your post where it exits at an angle.

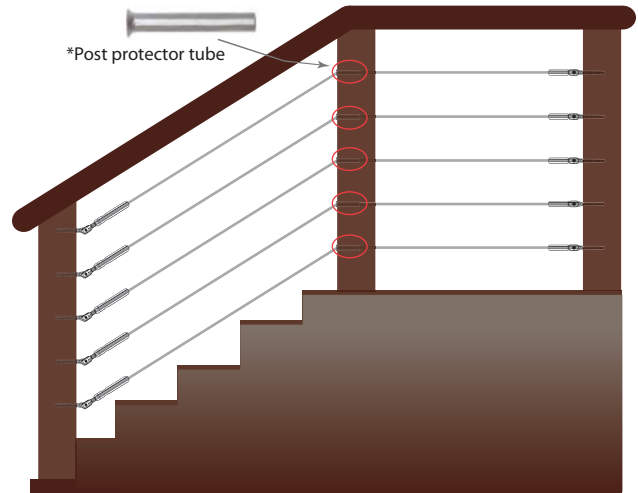


Illustration 9

## Wooden Posts With Composite Sleeves

For installations using wooden posts with composite sleeves enquire about the 500-C Series available by special order.

## Post Protector Tubes



Post protector tubes are sold separately. See page 26.



Figure 8: 200 Series



Figure 9: 200 Series

## Wood Post Installations Framework

Hundreds of pounds of tension is applied to end posts using cable railing. For this reason, posts must meet specific minimum requirements.

For more detailed technical information regarding framework for cable rail installations go to [bezdanultratec.com](http://bezdanultratec.com).

### INSTALLATION REQUIREMENTS

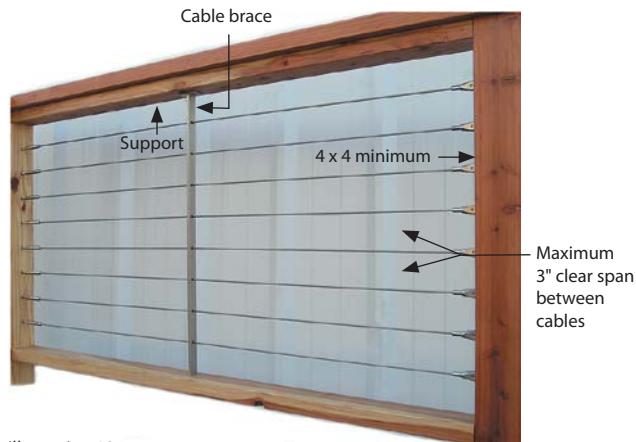


Illustration 10

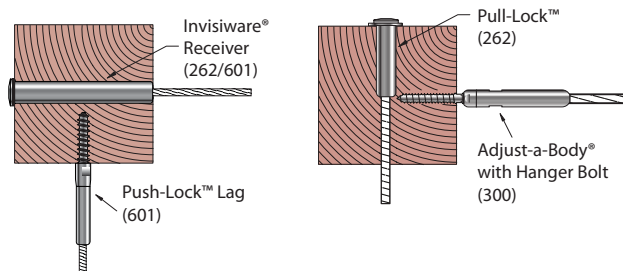


Illustration 11

#### End Posts

- Minimum 4 x 4 (3-1/2" square) post is required to keep from bending when cables are tensioned. Posts to which hardware is mounted must be constructed so that they will not show obvious deflection as the cables are tensioned to loads of 300-400 lbs. or more.
- Must be securely mounted to deck to prevent post from coming loose when cables are tensioned.
- A bottom rail is not required but helps distribute force away from the bottom of the post.

#### Intermediate Posts

The cable should be supported every 42" along its run to keep it from spreading.

Intermediate posts, other than those that are structurally necessary, can be a thin metal cable brace with holes for the cables to pass through (see Illustration 10). A typical cable brace is 1/4" thick by 1" wide made of steel, stainless steel or aluminum. Cable braces are available by special order, see page 28.

#### Top Rail

It is recommended to reinforce the flat edge under the top rail with a support such as a 2 x 4 (see Illustration 10).

#### Posts for Intersecting Runs

Ultra-tec® fittings are designed to create the look of continuous runs as they are able to reside on the same plane within the post in many configurations (see Illustration 11).

While you can use less expensive fittings and offset runs, it is more desirable to create the impression of continuous cables on the same plane.

## Installation Instructions

Complete installation instructions are included with each kit and can be found at [bezdanultratec.com](http://bezdanultratec.com).



# Wood Post Installation Instructions

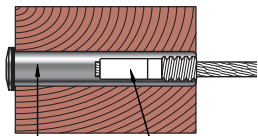
## 262 Series

### OUTSIDE-TO-OUTSIDE OF POST

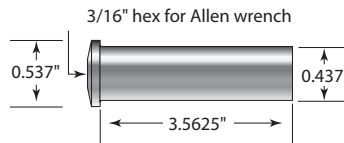
Uses 3-1/2" Invisiware® receiver and Pull-Lock™.

#### Invisiware® Receiver (tensioning end)

1. Slide the Invisiware® receiver into a pre-drilled hole in the end post. The inside is female-threaded.
2. Insert the pre-attached male-threaded swaging stud (swaged to one end of the cable) into the receiver. The threaded surface is coated with a baked-on molybdenum-based dry film lubricant to prevent the threads from binding when tensioned in extreme environments.
3. To tension simply insert an Allen wrench into the head of the receiver and rotate the receiver around the male threads to draw the stud and cable further inside the receiver. Note: The receiver can only be tensioned once the Pull-Lock™ is installed.
4. When installed only the head of the Invisiware™ receiver is exposed on the outside of the post.

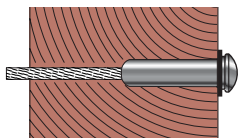


Receiver installed into 4 x 4 wood post. Note: The Receiver can rest against the outside of the post or the post can be counter bored with the receiver recessed in the post.

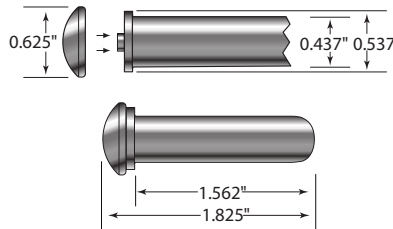


#### Pull-Lock™ (non-tensioning end)

1. After installing the tensioner on one end post, slip the Pull-Lock™ fitting into the other pre-drilled end post.
2. Pull the cable all the way through the Pull-Lock™ fitting (designed for 1x19 L.H. lay strand only - supplied).
3. Tension the cable by adjusting the Invisiware® Receiver with an Allen wrench.
4. Cut the excess cable off on the back side of the Pull-Lock™ with a 4" right angle grinder or a cutting wheel.
5. Press on the stainless steel cap to cover the bare cable end.
6. You're done!

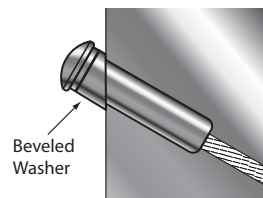


Pull-Lock™ installed into 4 x 4 wood post



### Beveled Washers

For installations on stairs use special beveled washers for both the Invisiware® receiver and the Pull-Lock™. See page 26 for product information.



## Wood Post Installation Instructions 601 Series

### INSIDE-TO-OUTSIDE OF POST

Uses 3-1/2" long Invisiware® receiver and Push-Lock™ lag.



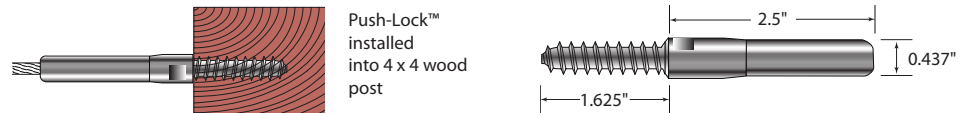
#### Invisiware® Receiver (tensioning end)

Step-by-step instructions are same as those for 262 Series: Wood Posts, Outside-to-Outside of Post, page 13.



#### Push-Lock™ (non-tensioning end)

1. After installing the tensioner on one end post, screw the Push-Lock™ lag into the inside of the other end post (fittings come in two parts so the lag can easily be driven into the 9/32" pre-drilled pilot hole in the wood post).
2. Cut the cable to length (designed for 1x19 L.H. lay strand only - supplied).
3. Push the cable into the Push-Lock™ fitting.
4. Tension the cable.
5. You're done!



The Push-Lock™ is actually two components that fit together: the lag and the Push-Lock™ coupler. The lag is slotted for an Allen wrench on one end to make it easy to screw into the post. Once installed, thread the Push-Lock™ coupler into the lag and you're ready to insert the cable.

## Installation Instructions

Complete installation instructions are included with each kit and can be found at [bezdanultratec.com](http://bezdanultratec.com).



Figure 10: 200 Series



## Wood Post Installation Instructions 300 Series

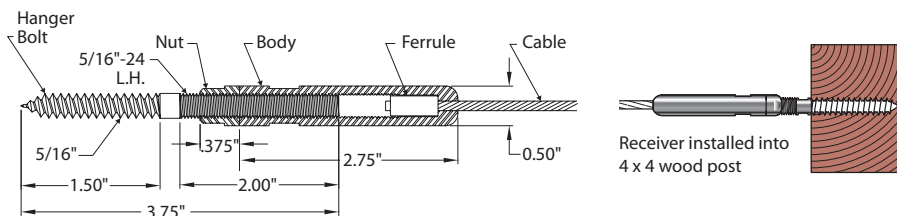
### INSIDE-TO-INSIDE OF POST

Uses Adjust-a-Body® with hanger bolt and Push-Lock™.

#### Adjust-A-Body® with Hanger Bolt (tensioning end)

The mounting end of the Adjust-A-Body® with hanger bolt has a male thread that mates with the female thread within the body of each tensioner. The swaging ferrule is supplied swaged onto the cable and holds the cable inside the body. The body rotates on the cable and provides a considerable amount of take-up during tensioning with an open-end wrench. After tensioning the lock nut locks the assembly in place.

1. Install the tensioning end first with the Adjust-A-Body® with hanger bolt by driving the hanger bolt/lag end into the 1/4" pre-drilled pilot hole in your end post.
2. Screw the lock nut all the way onto the 2" long threaded end of the bolt.
3. Slide the Adjust-a-Body® with hanger bolt (tensioning end) onto the bare end of the cable and pull it the length of the cable until it is stopped by the swaged-on ferrule.
4. Thread the body with the cable onto the threaded end of the bolt and turn half way along the threads.
5. Run the bare end of the cable through all your intermediate posts to your end post where the Push-Lock™ is installed.
6. Tension the cable.
7. You're done!



#### Push-Lock™ (non-tensioning end)

Step-by-step instructions are same as those for 601 Series: Wood Posts, Inside-to-Outside of Post page 14.



## Wood Post Installation Instructions

### 500-W Series

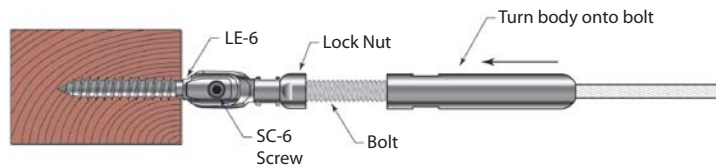
#### INSIDE-TO-INSIDE OF POST

Uses Adjust-a-Body® with threaded eye and Push-Lock™ threaded eye.



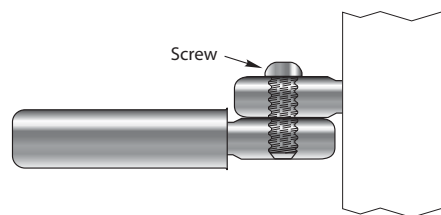
#### Adjust-A-Body® with Threaded Eye (tensioning end)

1. Drill 9/32" hole 1-1/2" into the inside of wood end posts and install the lag eyes.
2. Install the tensioning end first with the Adjust-A-Body® with threaded eye tensioner by attaching the eye with the SC-6 screw (supplied).
3. Screw the lock nut all the way onto the 2" long threaded end of the bolt.
4. Thread the body with the cable attached onto the threaded end of the bolt and turn half way up the threads.
5. Run the bare end of the cable through all of your intermediate posts and to the end post where you will be installing the Push-Lock™ fitting.



#### Push-Lock™ with Threaded Eye (non-tensioning end)

1. Drill 9/32" hole 1-1/2" into the inside of wood end posts and install the lag eyes.
2. Connect the Push-Lock™ fitting to the threaded part on the post by attaching the eye to eye with the SC-6 screw (supplied).



3. Cut cable to length (designed for 1x19 L.H. lay strand only - supplied).
4. Push the cable into the Push-Lock™ fitting.
5. Tension cable .
6. You're done!



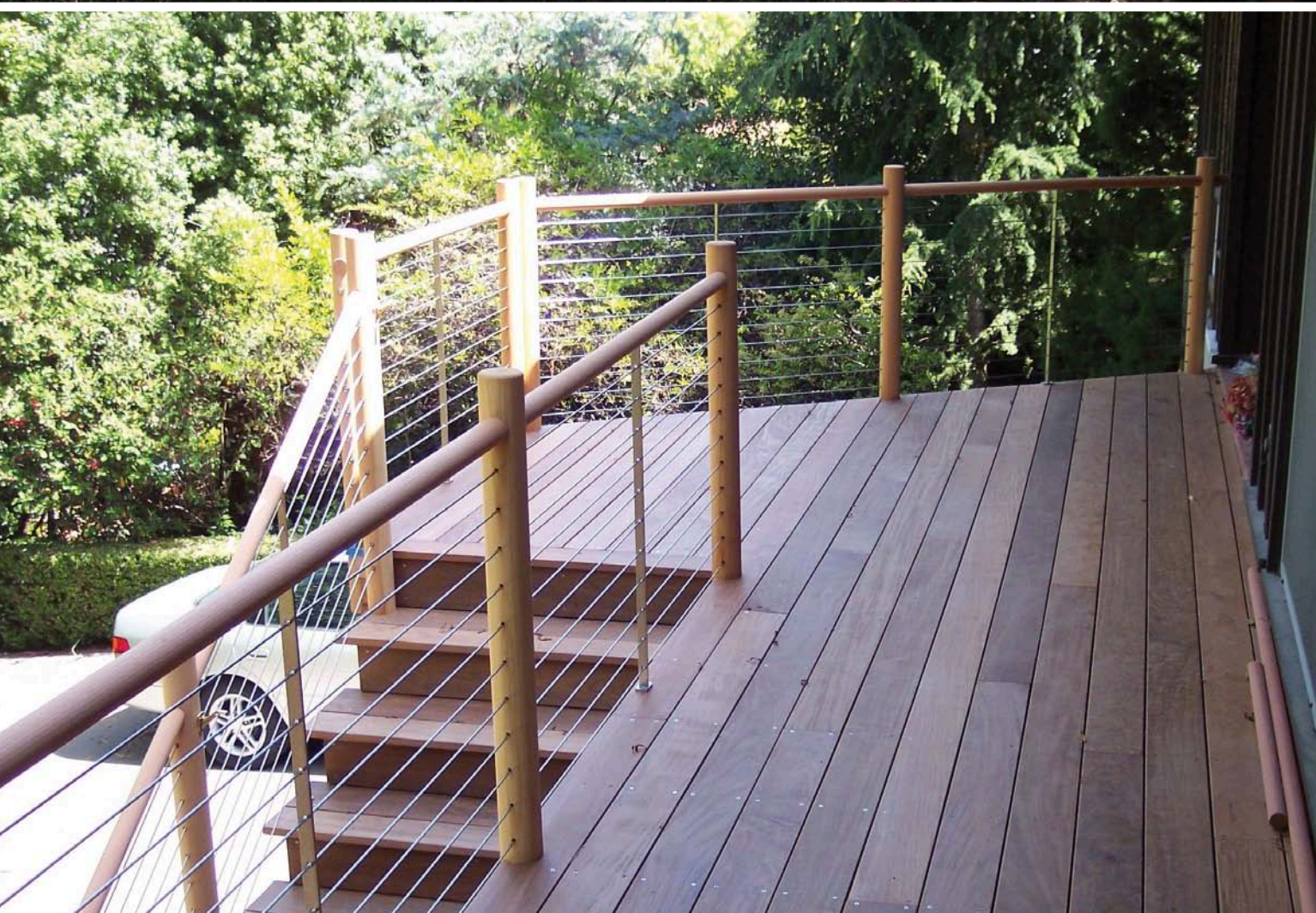


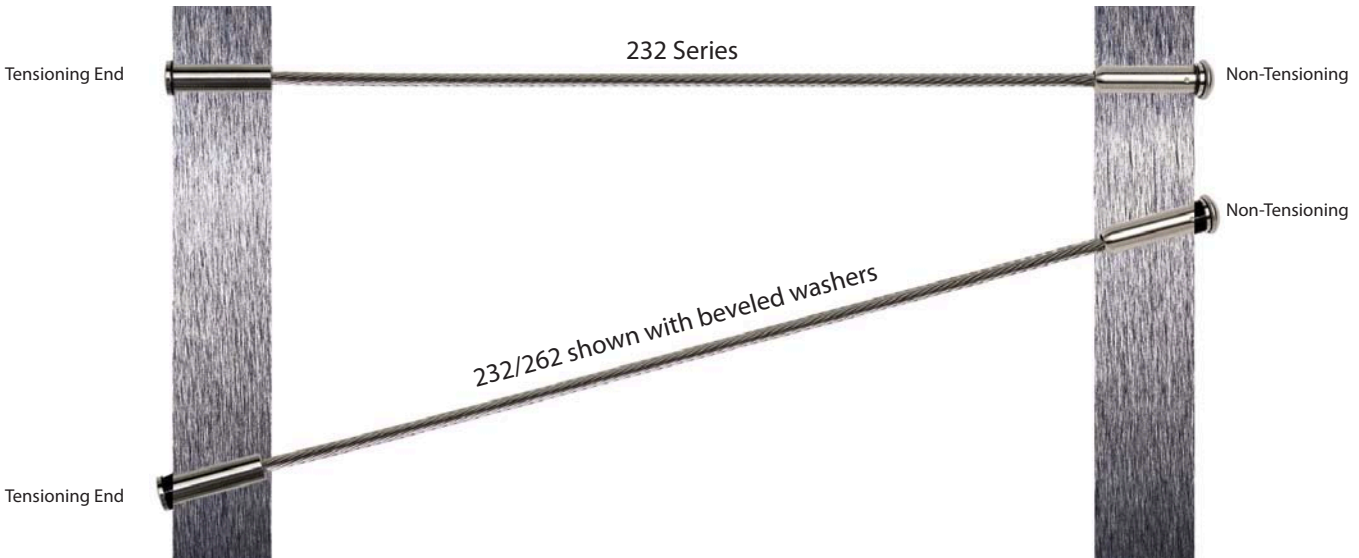




Figure 13: 200 Series



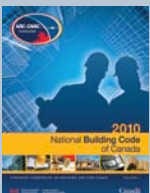
## Kits for Metal Posts



Installation instructions for each kit are available on page 25 and at bezdanultratec.com.

Kit	232 Series	262 Series
<b>Application</b>	Outside-to-Outside of Post up to 25'	Outside-to-Outside of Post up to 50'
<b>Post Access</b>	For use with end posts that are not obstructed	For use with end posts that are not obstructed
<b>End Caps</b>	Only the end caps are visible when used with 2" square post	End cap visible on one end and receiver visibly protrudes 1-1/2" when used with 2" square post
<b>Corners</b>	Does not accommodate corners	Accommodates one corner
<b>Fittings</b>	Uses 2" long Invisiware® receiver (tensioning end) and Pull-Lock™ (non-tensioning)	Uses a 3-1/2" long Invisiware® receiver (tensioning end) to allow the assembly to turn one corner; Pull-Lock™ (non-tensioning end) is used at the other end
<b>Angle (Stairs)</b>	Requires beveled washers	Requires beveled washers
<b>Features</b>	Tamper proof	Tamper proof

## Building Code Information



This product information is not intended for use as a recommendation for using or installing cable rail. It is the customer's responsibility to ensure compliance with local, provincial or national building codes. Always consult with your local building department before starting your project. Information about the 2010 National Building Code can be found in "Resources" or at bezdanultratec.com.

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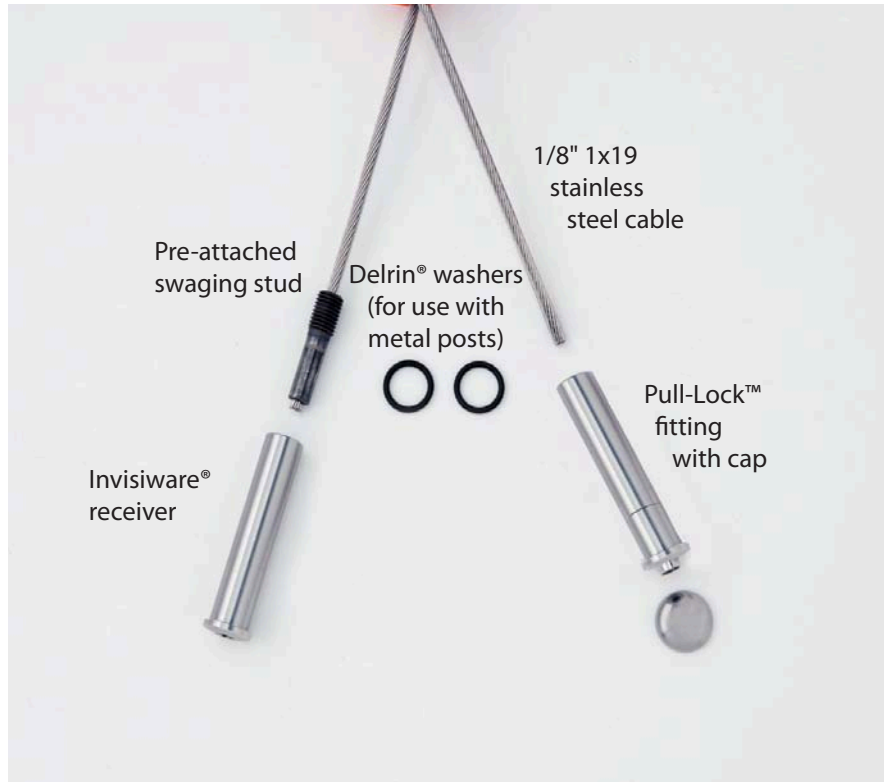
## Kits for Metal Posts 232 Series: Outside-to-Outside of Post

### 232 SERIES KIT

Ideal for installations of straight runs terminating at each post.

This kit includes cable and all necessary components for level installations.

- Tensioning device:  
2" long Invisiware® receiver
- Non-tensioning device:  
Pull-Lock™ fitting



Part #	Cable Length	INDOOR	OUTDOOR
		Cable Size	Weight
23205	5'	1/8"	0.33 lbs.
23210	10'	1/8"	0.50 lbs.
23215	15'	1/8"	0.68 lbs.
23220	20'	1/8"	0.84 lbs.
23225	25'	1/8"	1.01 lbs.

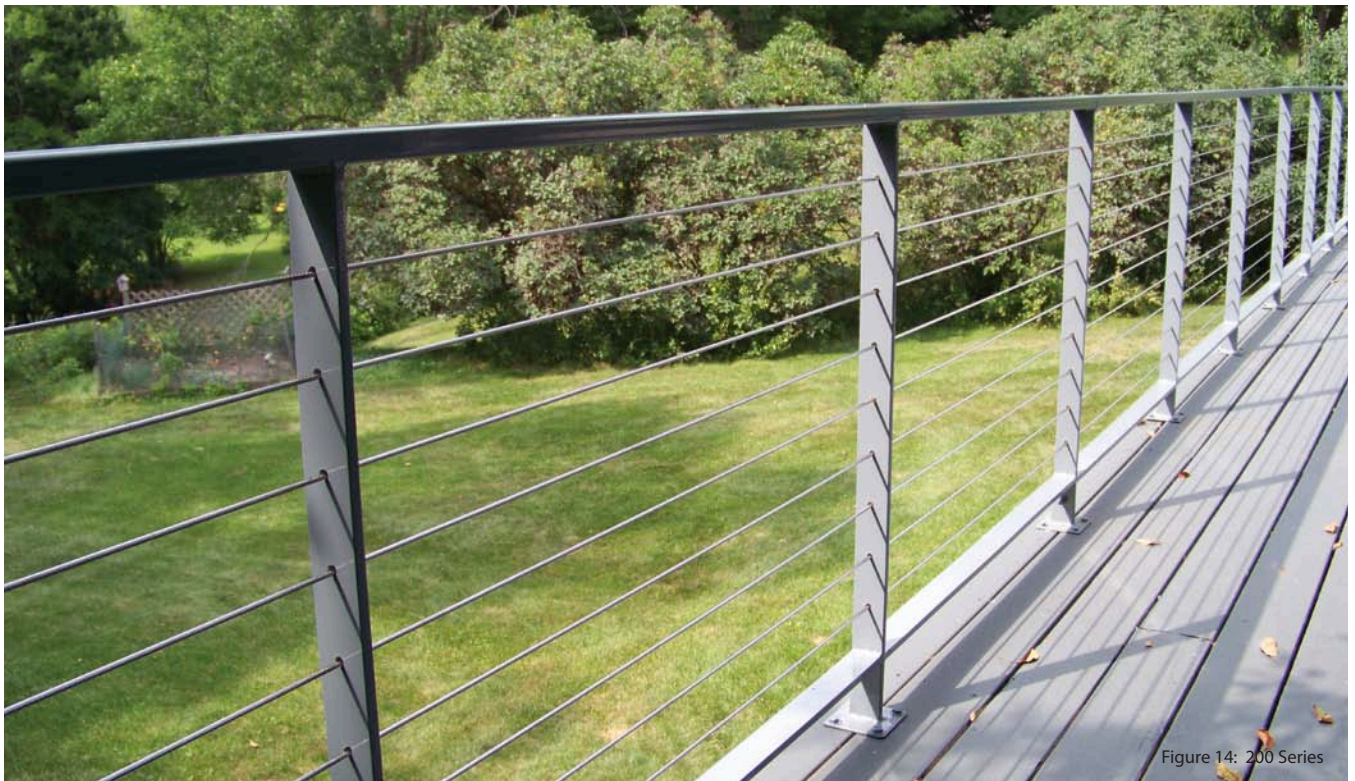


Figure 14: 200 Series



## Kits for Metal Posts 232 Series: Applications

### INSTALLATION REQUIREMENTS

- Dedicated end post for each run
- Minimum 3-1/2" access to the backside of each terminating post

#### Straight Runs Terminating at Post

Typical installation layout



Illustration 12

Kits for other size square tube as well as round pipe and tube are available. Please enquire.

## Extra Long Straight Runs

When a cable length greater than 25' is required, use the 262 Series. See pages 22 to 23 for product information.



### New! Cable Clips

Use the Cable Clip to add infill railing panels to the 232 and 262 Series! See page 26 for product information.



Figure 15: 200 Series

## Kits for Metal Posts

### 262 Series: Outside-to-Outside of Post

#### 262 SERIES KIT

Provides the flexibility to add a corner post to your straight run.

This kit includes cable and all necessary components for installation.

- Tensioning device:  
3-1/2" long Invisiware® receiver
- Non-tensioning device:  
Pull-Lock™ fitting

Part #	Cable Length	INDOOR	OUTDOOR	Weight
		Cable Size	Cable Size	
26205	5'	1/8"	0.37 lbs.	
26210	10'	1/8"	0.55 lbs.	
26215	15'	1/8"	0.72 lbs.	
26220	20'	1/8"	0.89 lbs.	
26225	25'	1/8"	1.07 lbs.	
26230	30'	1/8"	1.24 lbs.	
26240	40'	1/8"	1.59 lbs.	
26250	50'	1/8"	1.94 lbs.	

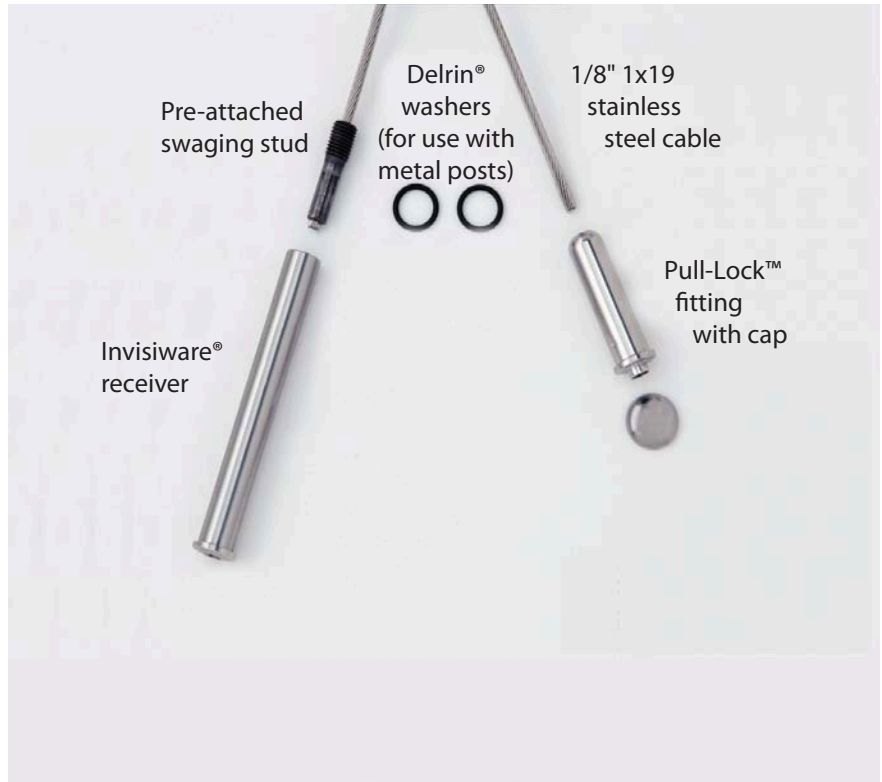


Figure 16: 200 Series



## Kits for Metal Posts 262 Series: Applications

### INSTALLATION REQUIREMENTS

- Dedicated end post for each run
- Minimum 3-1/2" access to the backside of each terminating post
- Corner bend does not exceed 45° at any one time

#### Straight Runs With One Corner

Typical installation layout

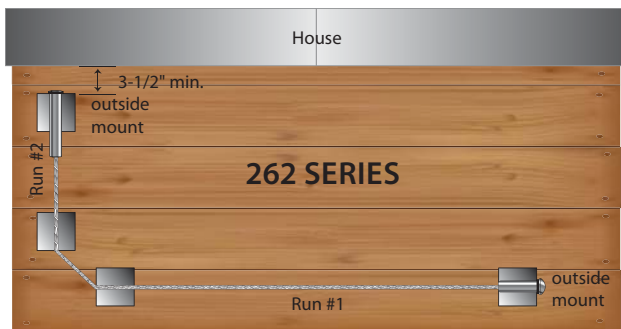


Illustration 13

**Important Note:** To ensure there is adequate tension when turning a corner a longer Invisiware® receiver is supplied. When used with a 2" square metal post please note that at least 1-1/2" of receiver will be exposed.

#### Straight Runs With Two Corners

For installations requiring two corner bends enquire about the 272 Series available by special order. Contact your Sales Representative for more information.

#### Angled Runs Terminating at Post

When the 262 Series is installed for an angled run a larger diameter washer is needed to distribute the load over a wider surface for both the receiver and Pull-Lock™ fittings. Order stainless steel washer 1/2SAE on page 26.



Figure 17: 200 Series



## Metal Post Installations Framework

Since hundreds of pounds of tension is being applied to end posts using cable railing, posts must be substantial enough to handle the tension. Please carefully review the requirements outlined on this page to ensure appropriate support. For more detailed technical information regarding framework for cable rail installations go to [bezdanultratec.com](http://bezdanultratec.com).

### INSTALLATION REQUIREMENTS

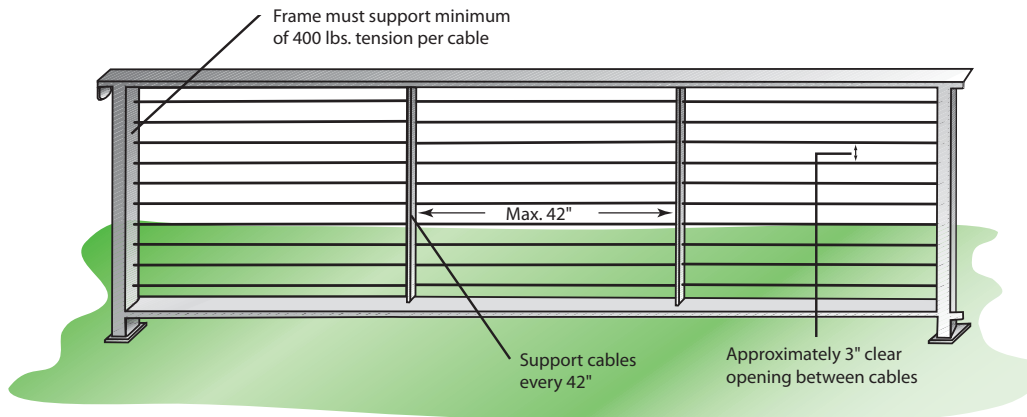


Illustration 14

#### End Posts

- 232/262 Series metal post kits are designed for use with 2" square tube. Stainless steel posts are strongly recommended for exterior applications.
- Wall thickness to be a minimum 1/4" wall to handle the load when the cables are tensioned while intermediate posts can be 1/8". The posts to which hardware is mounted must be constructed so that they will not show obvious deflection as the cables are tensioned to loads of 300-400 lbs. or more.
- Must be securely mounted to the deck to prevent the post from coming loose when cables are tensioned.
- A bottom rail is not required but does help distribute the force away from the lower portion of the post.
- If using aluminum the end posts should be reinforced. A bottom rail to prevent bowing is recommended (see Illustration 14).

#### Top Rail

- Must be sufficient in strength for structural integrity.

#### Intermediate Posts

The cable should be supported in some manner no less than every 42" along its run to keep it from spreading.

Intermediate posts, other than those that are structurally necessary, can be a thin metal cable brace with holes for the cables to pass through (see Illustration 14). A typical cable brace is 1/4" thick by 1" wide made of steel, which is then painted, or stainless steel. Intermediate posts are available on special order; see page 28.

## Detailed Installation Instructions

Complete installation instructions are included with each kit and can be found at [bezdanultratec.com](http://bezdanultratec.com).

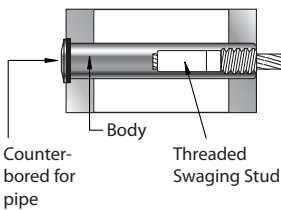
## Metal Post Installation Instructions 232 and 262 Series

### OUTSIDE-TO-OUTSIDE OF POST

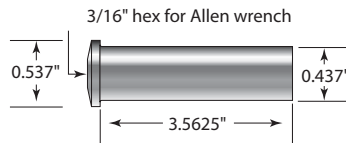
Uses 2" or 3-1/2" Invisiware® receiver and Pull-Lock™.

#### Invisiware® Receiver (tensioning end)

1. Slide the Invisiware® receiver into a pre-drilled hole in the end post. The inside is female-threaded.
2. Insert the pre-attached male-threaded swaging stud (swaged to one end of the cable) into the receiver. The threaded surface is coated with a baked-on molybdenum-based dry film lubricant to prevent the threads from binding when tensioned in extreme environments.
3. To tension simply insert an Allen wrench into the head of the receiver and rotate the receiver around the male threads to draw the stud and cable further inside the receiver. Note: The receiver can only be tensioned once the Pull-Lock™ is installed.
4. When installed only the head of the Invisiware™ receiver is exposed on the outside of the post.

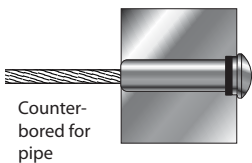


Receiver installed into 2" x 2" metal post. Note: The Receiver can rest against the outside of the post or the post can be counter bored with the Receiver recessed in the post.

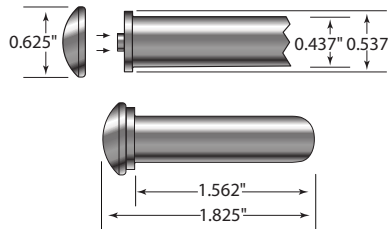


#### Pull-Lock™ (non-tensioning end)

1. After installing the tensioner on one end post, slip the Pull-Lock™ fitting into the other end post.
2. Pull the cable all the way through the Pull-Lock™ fitting (designed for 1x19 L.H. lay strand only - supplied).
3. Tension the cable by adjusting the Invisiware® Receiver with an Allen wrench.
4. Cut the excess cable off on the back side of the Pull-Lock™ with a 4" right angle grinder or a cutting wheel.
5. Press on the stainless steel cap to cover the bare cable end.
6. You're done!

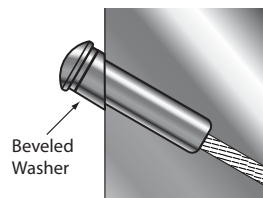


Pull-Lock™ installed into 2" x 2" metal post



### Beveled Washers

For installations on stairs use special beveled washers for both the Invisiware® receiver and the Pull-Lock™. See page 26 for product information.



## Accessories

### CABLE CLIP FOR INFILL RAILING PANELS\*



The Cable Clip is an economical addition to our standard 1/8" diameter cable rail kits and makes this choice of cable rail system accessible to your clients!

The Cable Clip supports a tempered glass or resin panel up to 1/4" thickness (we recommend using no less than a 3/16" thickness). Your choice of infill panel is easily installed using the Cable Clip and easily removed for cleaning. The Clip is fastened on 1/8" cable using a stainless steel M6 set screw. The infill panel is securely held in place with a stainless steel M8 set screw.

\* Cable Clips are engineered and tested to meet the National Building Code of Canada (NBC) requirements for infill loads. Test data and additional product information can be found at [bezdancableclip.com](http://bezdancableclip.com).

INDOOR OUTDOOR

Part #	CC-1.8-SN
Cable Size	Suits 1/8"*
Material	Solid Brass
Finish	Electro-plated Satin Silver
Weight	0.11 lbs.

\* Bezdan Ultra-tec® Series 200 only.



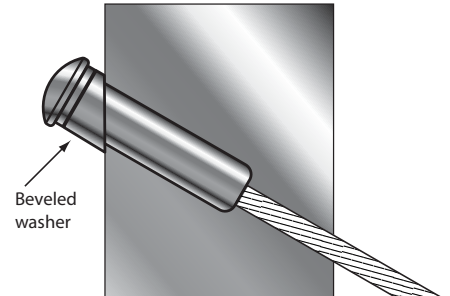
Figure 18: 200 Series with Cable Clip

### BEVELED WASHERS



Made of stainless steel for use on stairways or slopes where you need to drill your end post holes at an angle.

For use with Invisiware® receivers and Pull-Lock™ fittings.



INDOOR OUTDOOR

Part #	BW32-6
Stair Slope	30° to 33°
Cable Size	1/8"
Weight	0.013 lbs.

### 1/2SAE STAINLESS STEEL WASHER

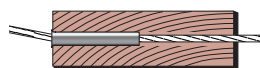
Use with beveled washer for wood or stainless steel posts.



INDOOR OUTDOOR

Part #	1/2SAE
Washer O.D.	1-1/16"
Washer I.D.	17/32"
Weight	0.014 lbs.

### POST PROTECTOR TUBE (STAINLESS STEEL)



The post protector tube is inserted into a wood post where the cable enters/exits the post at an angle to keep the cable from biting into the wood.

INDOOR OUTDOOR

Part #	CS-TUBE-6
Cable Size	1/8"
Weight	0.007 lbs.



## Accessories

### HANGER BOLT DRIVER (1/2" DRIVE)



Use to install Adjust-A-Body® with Hanger Bolt tensioners. Makes driving hanger bolts fast and easy.

Part #	DRIVER HB-6N
Cable Size	1/8"
Weight	0.46 lbs.

### CABLE RELEASE



Releases cable from Push-Lock™ and Pull-Lock™ type fittings before cables are tensioned. The key opens the spring-loaded jaws that grip the cable prior to tensioning.

Part #	PL-KEY
Weight	0.026 lbs.

### CABLE CUTTER



For burr-free cutting of 1/8" diameter cable.

Part #	C-Cutter
Cable Size	1/8"
Weight	0.74 lbs.

### STAINLESS STEEL CLEANER AND PROTECTANT



Dissolve minor corrosion, then leave a protective coating that lasts for months. Includes an 8-oz. spray-on rust and stain remover and a 4-oz. bottle of protectant.

Part #	T9RFSM
Weight	1.00 lbs.



Figure 19: Deck rail installation with cable braces

## Accessories



The thin profile of the brace will not impede your view!

### CABLE BRACE, STAINLESS STEEL

For use with 1/8" cable to keep cable spacing consistent between structural posts on stairs or level runs. Brace is 1/4" x 1" solid stainless steel and available for 36" and 42" high rails. Holes are drilled 3-1/8" on center.

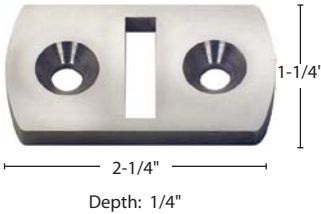
For metal frames, weld the brace in place.

For wood frames, use cable brace floor plates (sold separately, shown below).

INDOOR OUTDOOR

Part #	Use	Length	# of Holes	Weight
◆ CB-34.5-SS-10	Level	34.5"	10	2.20 lbs.
◆ CB-40.5-SS-12	Level	40.5"	12	2.63 lbs.
◆ CBS-34.5-SS-10	Stairs	34.5	10	2.20 lbs.
◆ CBS-40.5-SS-12	Stairs	40.5"	12	2.48 lbs.

Products marked with a ◆ are available on special order. Contact your Sales Representative for more information.



### CABLE BRACE, FASTENING PLATES, STAINLESS STEEL

For mounting the stainless steel cable brace on wood frames (shown above) to the top or bottom rail or deck.

INDOOR OUTDOOR

Part #	Finish	Weight
◆ FLP-CBS	#4 Satin	0.16 lbs.

Products marked with a ◆ are available on special order. Contact your Sales Representative for more information.



The thin profile of the brace will not impede your view!

### CABLE BRACE, ANODIZED ALUMINUM

For use with 1/8" cable on stairs or level runs in wood frames to keep cable spacing consistent between structural posts. Brace is 3/4" x 3/4" hollow tube and is available for 42" high rails or to cut to size. Cable holes are drilled 3-1/8" on center for level runs but undrilled for stairs. Use cable brace floor plugs (included) to attach to top and bottom rail or deck.

INDOOR OUTDOOR

Part #	Use	Finish	# of Holes	Weight
◆ CB-42-AN-AL-13P	Level	Clear Anodized	13	0.71 lbs.
◆ CB-42-BL-AL-13P	Level	Black Anodized	13	0.71 lbs.
◆ CB-42-AN-AL-P	Stairs	Clear Anodized	None	0.71 lbs.
◆ CB-42-BL-AL-P	Stairs	Black Anodized	None	0.71 lbs.

Products marked with a ◆ are available on special order. Contact your Sales Representative for more information.