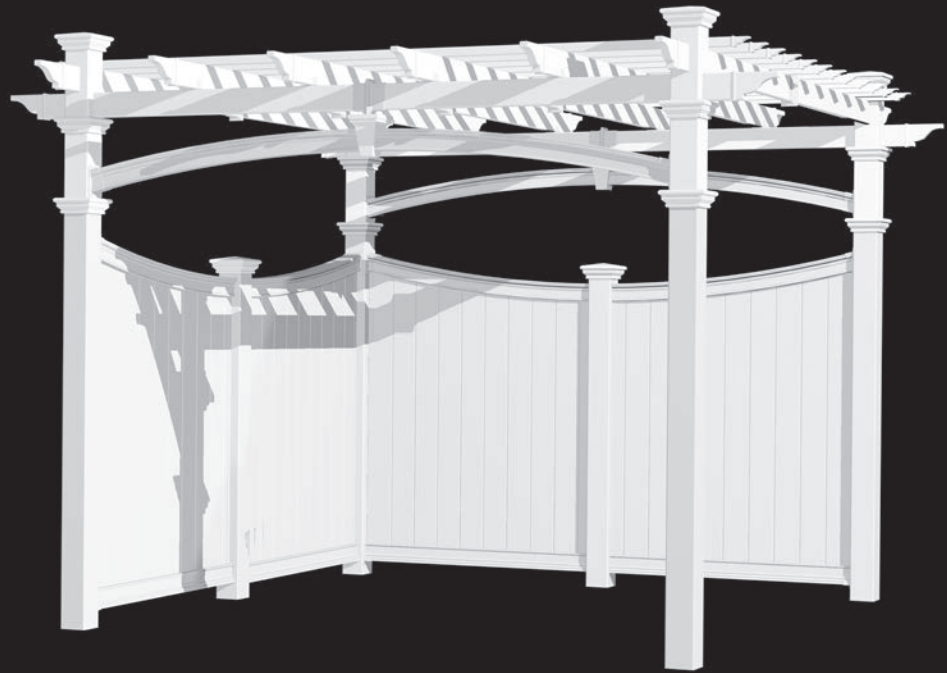


10 x 10 Flat Top Pergola



ASSEMBLY GUIDE

Models: Venetian, Tuscany, Luxor, Arcadia

OPTIONAL ACCESSORIES

- Arch Kit System (2 Arches)
- Privacy Fence Panel System (2 Panels & Middle Post)
- Bolt Down Bracket Kit (4 for Pergola)
- Additional Shade Slats Kit (Not Shown) (12)
- Pergola Wall
- Pergola Planter



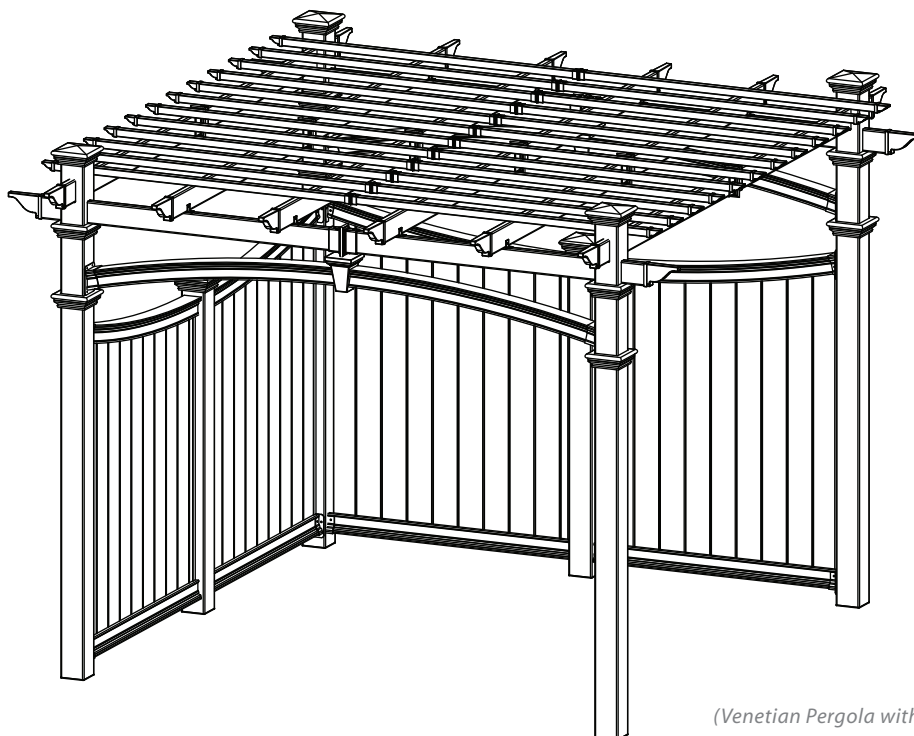
New England
Arbors
Leadership by Design

www.newenglandarbors.com

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Pergola Materials Overview.....	4
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Decorative Arch Kit Assembly & Installation.....	15
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Introduction & Overview



(Venetian Pergola with Accessories Shown)

Getting Started

First off, allow us to say thank you for the investment you have made in one of our fine pergola kits. This kit is designed to be assembled and installed ideally by two people with basic carpentry knowledge and tools. Do not attempt alone, especially during the installation stage. Should you decide to moderately modify the dimensions of your pergola from the standard kit size, a circular saw with a sharp fine-tooth blade is all that is needed to cut, shorten or modify the vinyl components. The steel stiffeners for the main beams and rafters can be cut down using either a hacksaw or a motorized cutting device designed to cut steel. When assembling components place on a non-abrasive surface (ie: shipping box) to avoid scratching. We recommend a 15'x15' area for unobstructed assembling. You should not need to use excessive force when assembling any components.

Planning & Preparing

Because this project is made to stand independent of your home, you can either locate it near your house or let it stand alone in the garden. By keeping it unattached from your home you will not have to deal with moving existing gutters or matching eave heights. If you plan to build your pergola close to the house, please keep the outer extremities of the pergola a minimum of 4 inches back from your eaves.

What looks like the toughest part of this project is actually the easiest, the graceful, solid-looking columns. We've designed these columns to simply be slipped over treated 4x4 wood posts that are either embedded in concrete or directly mounted to a concrete or wood surface using our bolt down brackets. See pages 7, 8 and 9 for more details.

It is critical before you start, to consider the current slope of elevation where the pergola is planned - if there is any. Also utility or sprinkler line location is important to identify prior to excavating holes if necessary. You should also check to verify local building codes, ordinances, neighbourhood covenants, or height restrictions regarding this type of structure.

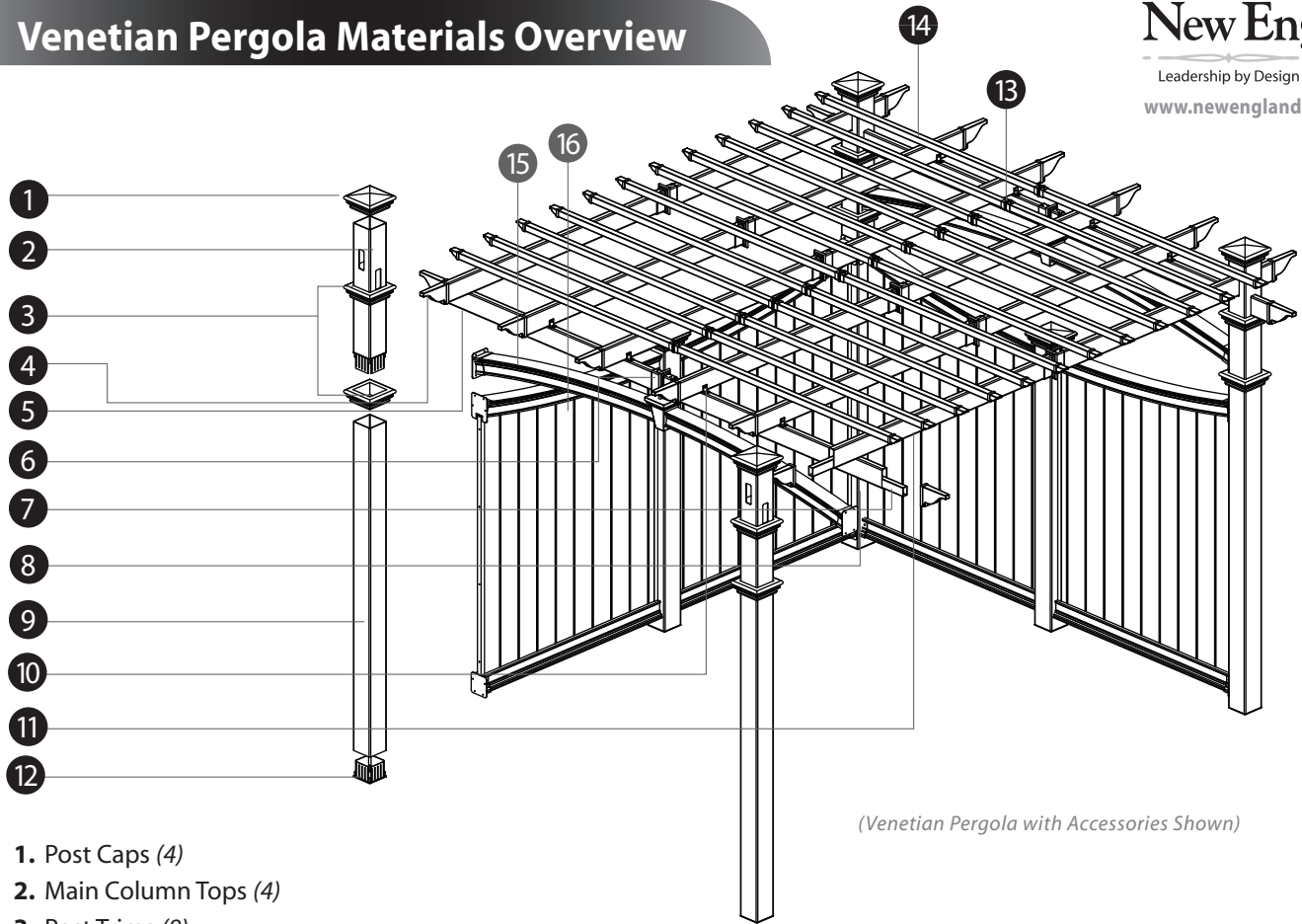
Restriction of Use

*This product **is not** designed to carry additional weight loads such as swings, people or other objects.*

Please take the time to read this instruction guide thoroughly prior to the construction of your pergola. If you have any questions, feel free to contact our technical dept by calling 1 800 282 9346 (Mon to Fri 8:00 A.M to 4:00 P.M. EST).

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Venetian Pergola Materials Overview

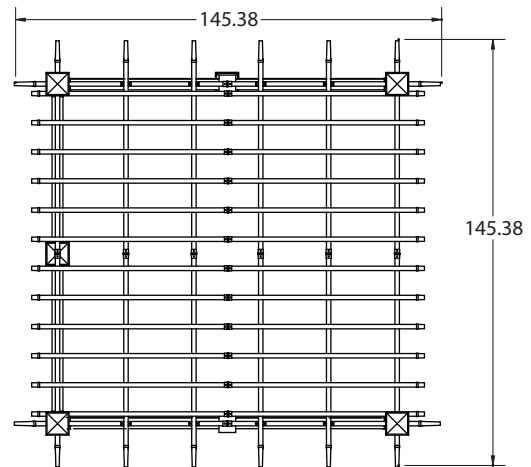


(Venetian Pergola with Accessories Shown)

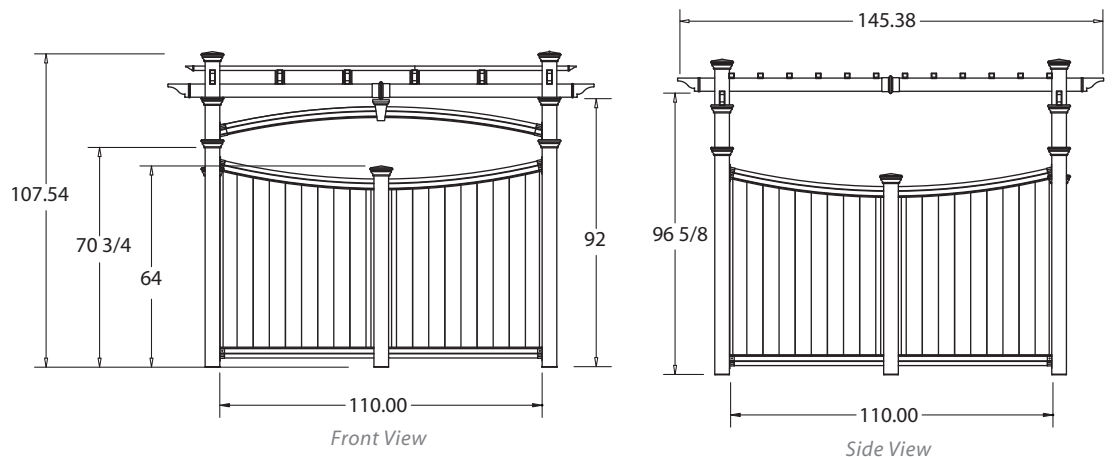
1. Post Caps (4)
2. Main Column Tops (4)
3. Post Trims (8)
4. Rafter & Beam Decorative End Caps (16)
5. Main Support Beams with pre-drilled holes on one side(4)
6. Beam & Rafter Joiners (8)
7. Long Steel Stiffeners for Main Support Beams & Rafters(8)
8. Short Steel Stiffener for Main Beams(4)
9. Main Column Bottoms (4)
10. Rafter Brackets (8)
11. Rafters (12)
12. One Way 4"x4" Internal Wood Post Guide (4)
13. Shade Slat Joiners (12)
14. Shade Slats (24)

OPTIONAL ACCESSORIES (Purchased Separately)

15. Decorative Arch Kit (2 Included)
16. Privacy Fence Panel System (2 Panels & Middle Post Included)



Top View



Front View

Side View

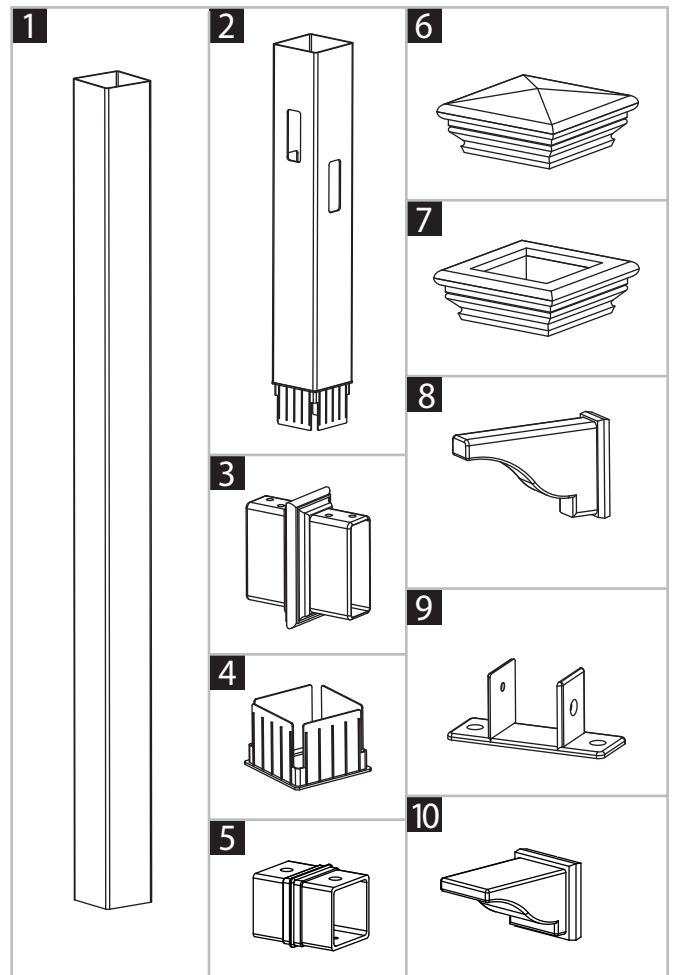
Venetian Pergola Materials Breakdown

(Venetian Pergola Accessories Not included)

Check Boxes (Total of 5) for These Contents

In the event of missing or defective parts please call our customer service dept. at **1 800 282 9346** (Mon. to Fri. 8:00 AM to 4:00 PM EST).

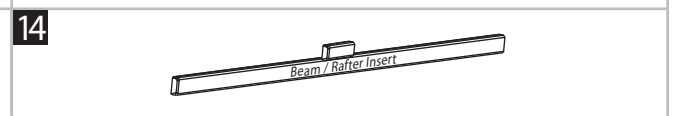
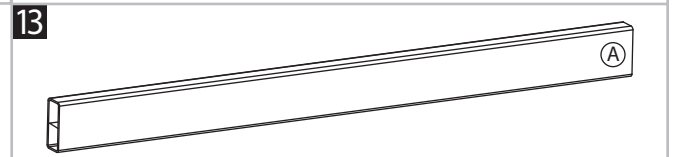
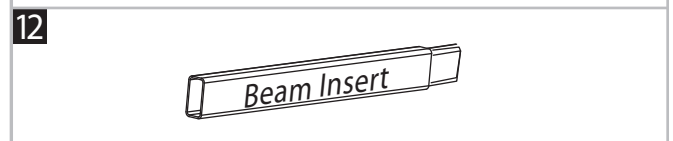
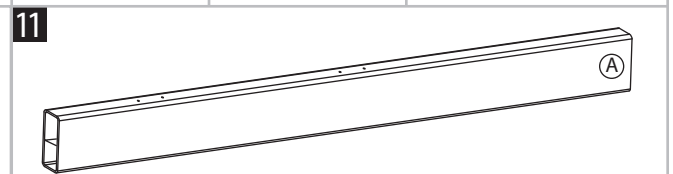
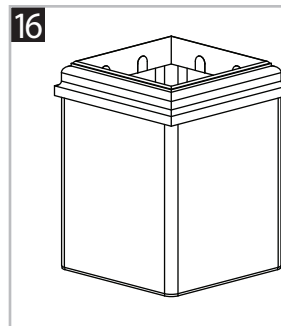
1. Main Column Bottoms (4)
2. Main Column Tops (4)
3. Beam & Rafter Joiners (8)
4. One Way 4"x4" Internal Wood Post Guide (4)
5. Shade Slat Joiners (12)
6. Post Caps (4)
7. Post Trims (8)
8. Rafter & Beam Decorative End Caps (16)
9. Rafter Brackets (8)
10. Shade Slat Decorative End Caps (24)
11. Main Support Beams (With Pre-Drilled Holes One Side) (4)
12. Steel Stiffener Inserts for Main Support Beams (4)
13. Rafters (12)
14. Steel Stiffener Inserts for Main Support Beams & Rafters (8)
15. Shade Slats (24)



Tuscany Pergola Materials Breakdown

(Includes the above 5 boxes plus a 6th box with short base molds)

16. Short Base Mold (4)

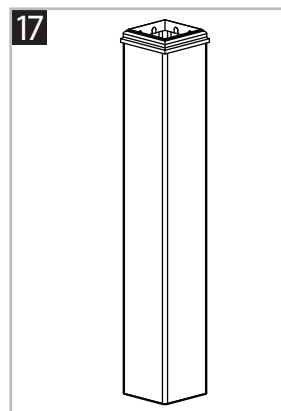


Not to Scale

Luxor Pergola Materials Breakdown

(Includes the above 5 boxes plus a 6th box with tall base molds)

17. Tall Base Mold (4)



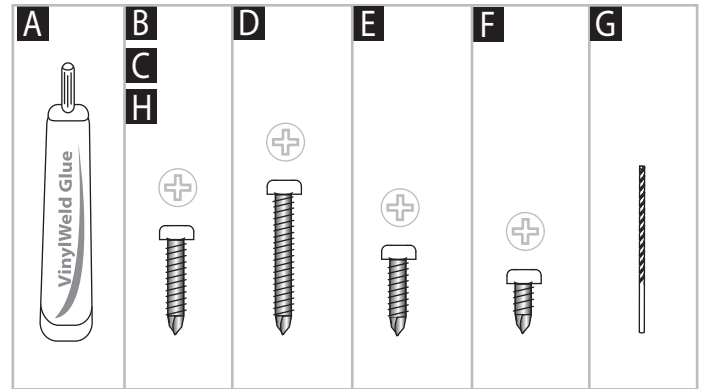
Pergola Additional Materials List

Hardware *(in plastic bag)*

NOTE: WE HAVE INCLUDED 10% EXTRA SCREWS BEYOND WHAT IS IDENTIFIED BELOW.

All Screws Included with this Kit are Self-Auguring.

- A.** Vinyl Weld Glue (3)
- B.** 2 1/2" Self-Auguring Stainless Steel Screws (16)
(to lock vinyl column and wood post together at bottom of each post)
- C.** 2 1/2" Self-Auguring Stainless Steel Screws (16) *(to lock vinyl column and wood post together at top of each post just above trim cap)*
- D.** 4" Self-Auguring Stainless Steel Screws (64) *(to lock the intersection of beams and first rafters with vinyl columns)*
- E.** 1 1/2" Self-Auguring Stainless Steel Screws (48) *(joiner screws)*
- F.** 5/8" Self-Auguring Stainless Steel Screws (32) *(for rafter brackets)*
- G.** 1/8" x 2" Drill Bit (1) *(to pre-drill holes on bottom of joiner to penetrate steel inserts as necessary)*
- H.** 2 1/2" Self-Auguring Stainless Steel Screws (72) *(for shade slats)*



Extra Materials You will Need

(Purchase separately from www.newenglandarbors.com or retailer of our products)

If Mounting Pergola on Concrete or Wood Deck

- I.** 4x4x7 Pressure-Treated Wood Posts (4) *(purchase at local building center)*
- J.** 4x4 Bolt Down Bracket Kit *(purchase from www.newenglandarbors.com or a retailer of our products)*
- 1/4" x 2 3/4" Concrete Screws or Wood Screws (12)
- 3/16" Concrete Drill bit. Min 3" long (1)
- Post Shims 1/2" x 3 1/2" x 12" (32)

If Mounting Pergola in Ground

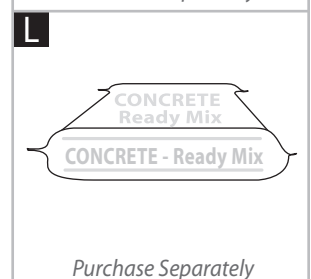
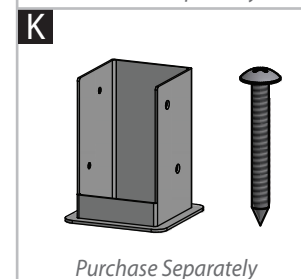
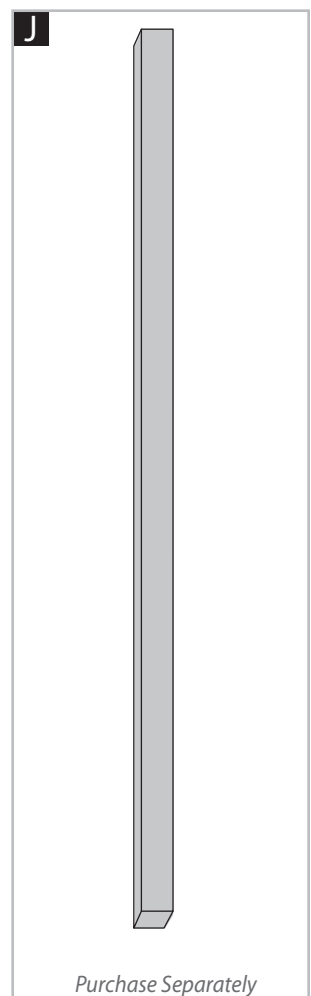
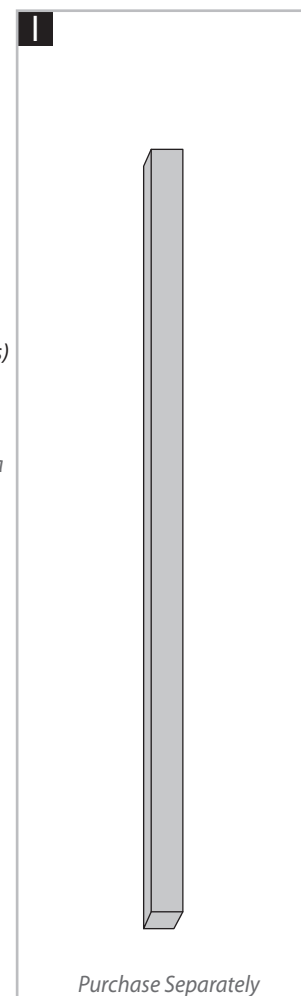
- K.** 4x4x10 Pressure-Treated Wood Posts (4) *(purchase at local building center)*
- L.** Concrete Ready Mix (4) *(purchase at local building center)*

Tools You Will Need

- Level
- Hammer
- Tape Measure
- String Line
- Wood Stakes (4) *(temporary support for string line)*
- Step Ladders (2)
- Cordless Drill

Tools You May Need

- Circular Saw with Fine Tooth Blade
- Framing Level
- Framing Square
- Hacksaw *(or a motorized cutting device designed to cut steel)*



Not to Scale

Wood Post Layout & Installation for In-Ground Application

This pergola can also be installed on a pre-existing wood or concrete surface using our bolt down bracket system with a 4x4 wood post (sold separately). See page eight for more details.

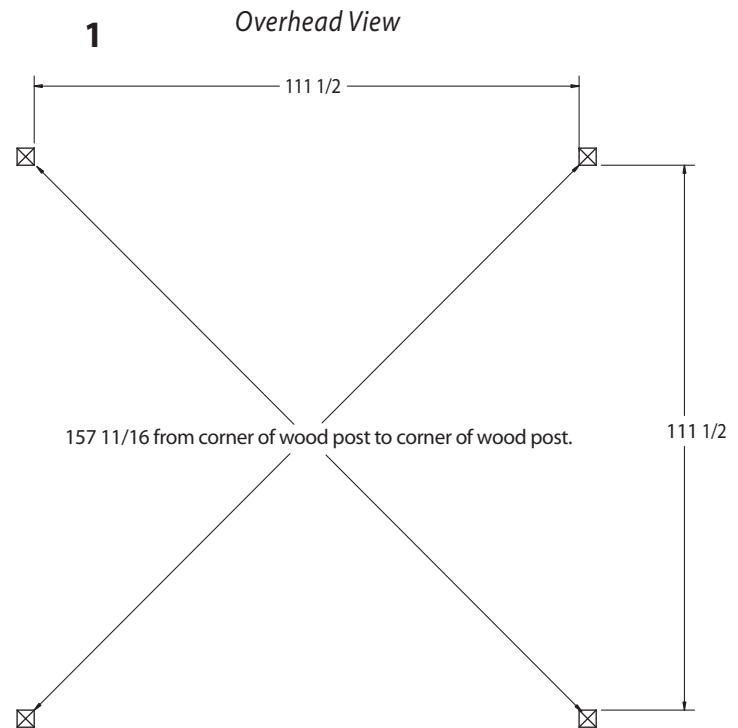
Post location and placement is the most critical step in the overall installation process. Please double check for the possibility of any underground utilities such as sprinkler, gas or telephone lines.

STEP ONE

Measure and mark out the location of the pergola posts using string line and temporary wood stakes. Diagonal distances must be the same to ensure a square installation. Adjust string lines accordingly. The inside corner of the string lines will be the post location.

Please Note:

Should you decide to moderately modify the dimensions of your pergola from the standard kit size, a circular saw with a sharp fine-tooth blade is all that you need to cut, shorten or modify the vinyl components. The steel stiffeners for the main beams and rafters can be cut down using either a hacksaw or a motorized cutting device designed to cut steel.



STEP TWO

Install Wood Supporting Posts Directly into the Ground

1

After you have determined where the posts will be located, excavate 10" diameter x 36" deep post holes.

2

After holes are dug and cleaned, place the 4x4 wood post into a hole ensuring it's level and square to string lines. The final post height should be no more than 84" out of the ground. If a post is higher because of obstructed excavation of footings, please cut down in height accordingly.

3

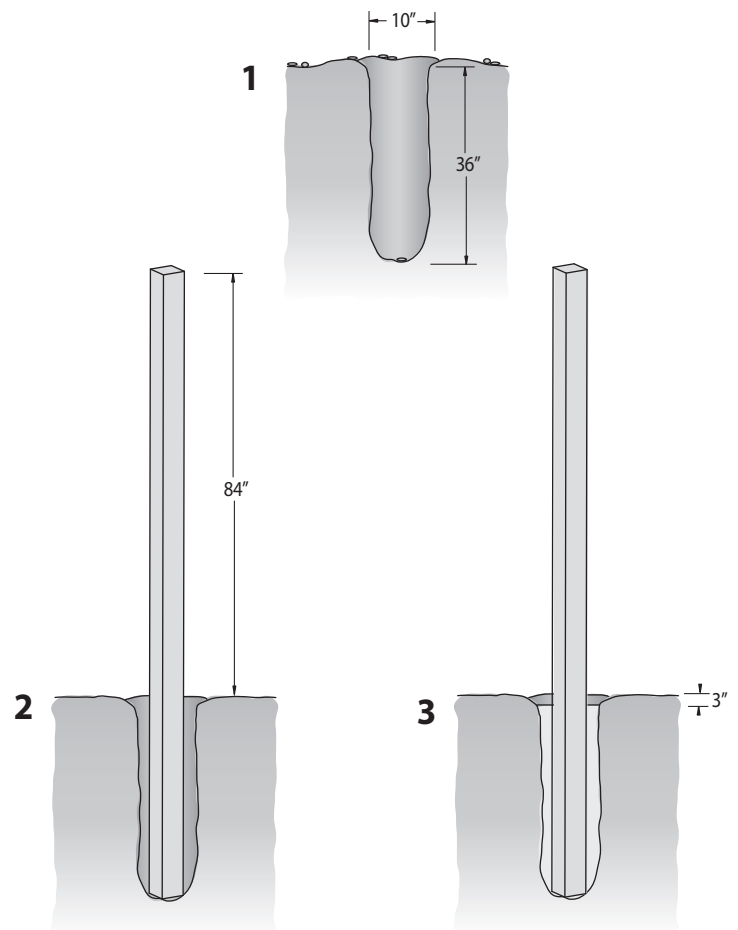
Fill the vacant hole with pre-mixed concrete all the way to within 3" of the top of the hole. After the concrete has set, back fill the 3" space with soil/sod.

4

Repeat for all four posts.

Please Note:

Some 4x4 pressure treated posts can be larger than 3 1/2 x 3 1/2 square due to twisting or cracking. We have allowed a tolerance for this in the internal one way and two way 4x4 wood post guides (see page 8). However in extreme cases you may need to shave down the top of the 4x4 wood post slightly to get the vinyl post started over the wood post. Before installing your wood posts in the ground, please check to confirm this and correct at this stage if necessary.



OPTIONAL STEP

Wood Post Layout & Installation Using Bolt Down Brackets for Concrete or Wood Surface

1

Measure and mark out the location of the bolt down brackets using string or chalk line. Diagonal distances must be the same to ensure a square installation. Adjust string lines accordingly. The inside corner of the string lines will be the corner of the bottom flange.

2

Mark out the location of bolt down brackets accordingly using the base of the bracket accordingly.

3

Using a 3/16" masonry drill bit, drill 3" deep holes to allow installation of 2 3/4" concrete screws (Not included)

4

Proceed to install three 2 3/4" concrete screws into the bottom base of the bolt down bracket. (Not included)

Please Note:

Concrete patios generally have sloped surface for water run-off. If this is the case, when you secure the bolt down bracket to the concrete, the bracket may be at an angle. This can be corrected for level using galvanized steel washers (not provided), acting as shims underneath the base to level - **VERY IMPORTANT OR PERGOLA BEAMS AND RAFTERS WILL NOT BE LEVEL.**

5

With the four post brackets installed plumb, proceed to set the 4x4 x7' wood post in place. Use wood screws to secure the posts to the bracket. Repeat for all 4 posts.

6

Posts should be approximately 84" in height.

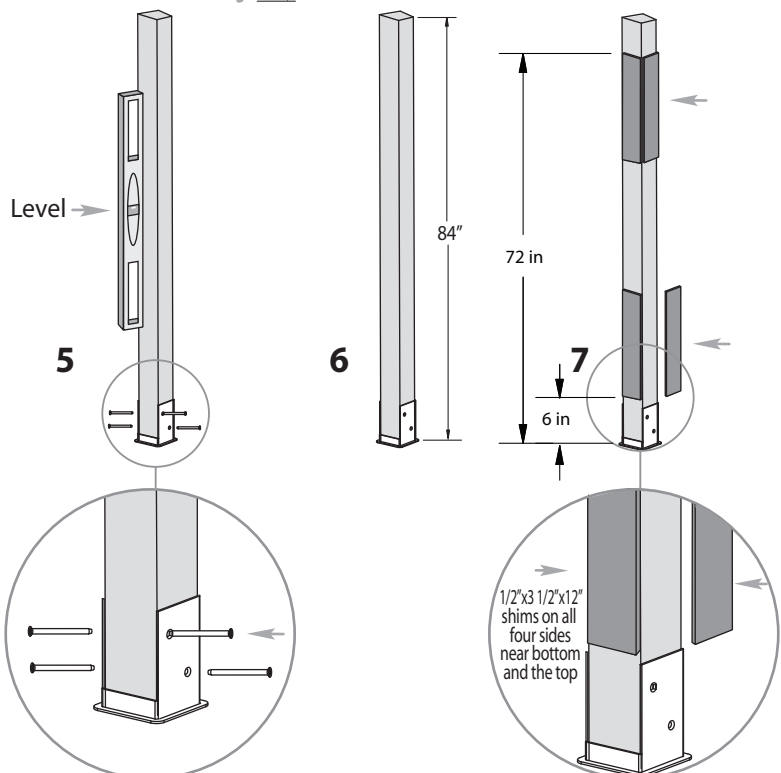
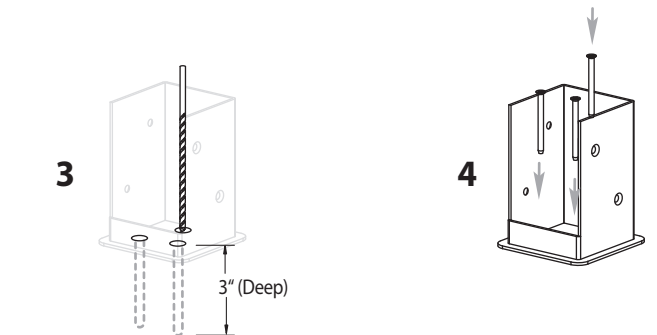
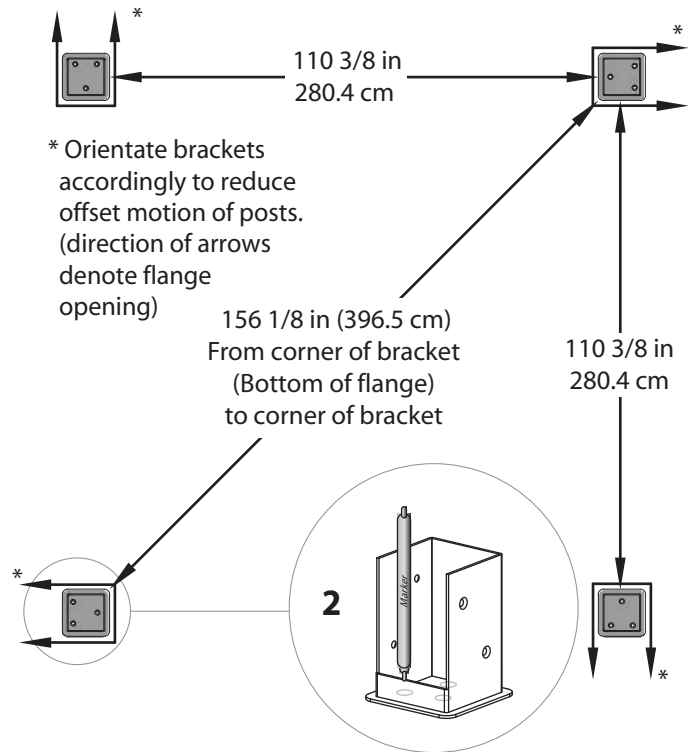
7

Attach 8 post shims to each of the wooden post, placing shims (6") on all four sides, near the bottom & top (72")

Please Note:

Some 4x4 pressure treated wood posts can be larger than 3 1/2 x 3 1/2 square due to twisting or cracking. We have allowed a tolerance for this in the post brackets and the internal one way and two way 4x4 wood post guides. However in extreme cases, you may need to shave down the end of your 4x4 wood post slightly to allow access.

1



STEP THREE

Vinyl Column Assembly & Installation Over Wood Posts

1

Using the vinyl weld glue, insert the One Way 4"x4" Internal Wood Post Guide in the one end of the main column posts. This step is only applicable if your wood 4x4 post are embedded into the ground. If your pergola is going to be installed on wood or concrete surface, please dispose of these four pieces.

2

Using a step ladder, guide the bottom vinyl columns over the wood 4x4 posts.

3

If you purchased Tuscany or Luxor Pergola, slide the base mold on post.

Note: If you are installing a Privacy Wall on the pergola, do not install base mold on the posts with side panel.

4

Using a step ladder guide the top vinyl columns over the wood 4x4 posts.

Please Note:

Ensure that holes at top of column are orientated correctly for future beam and rafter placement. See diagram at top of next page.

5

Connect the bottom and top vinyl column by using vinyl weld and sliding together. **Please Note:** Vinyl Weld Glue has about a sixty second cure time and about a 20 minute dry time.

6

Slide the bottom post trim into position to cover the joint on the column.

7

Slide the top post trim into approximate position just below the bottom routed hole on the bottom of the top vinyl column assembly.

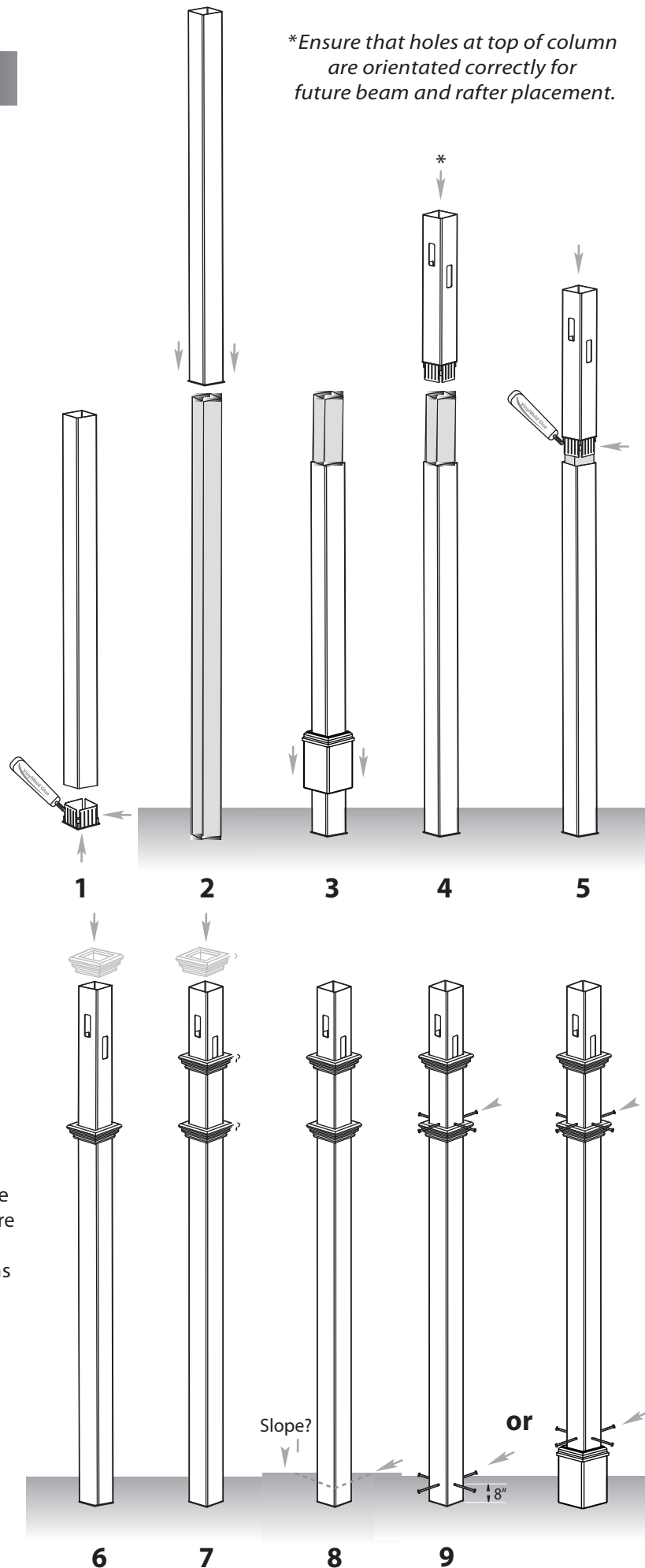
8

If necessary, adjust post heights accordingly to ensure future level installation of beams and rafters as necessary. If slope is severe causing a height difference between the posts, you may need to trim down the bottom of two or more of your vinyl columns as necessary.

9

Secure the vinyl columns to the wood posts using 4 - 2 1/2" self-auguring stainless steel screws at 8" up from the base of the posts, and 4 - 2 1/2" self-auguring stainless steel screws just above the trim cap as illustrated. This will prevent possible uplift during high winds, etc. If base moldings are installed, position screws above the base moldings.

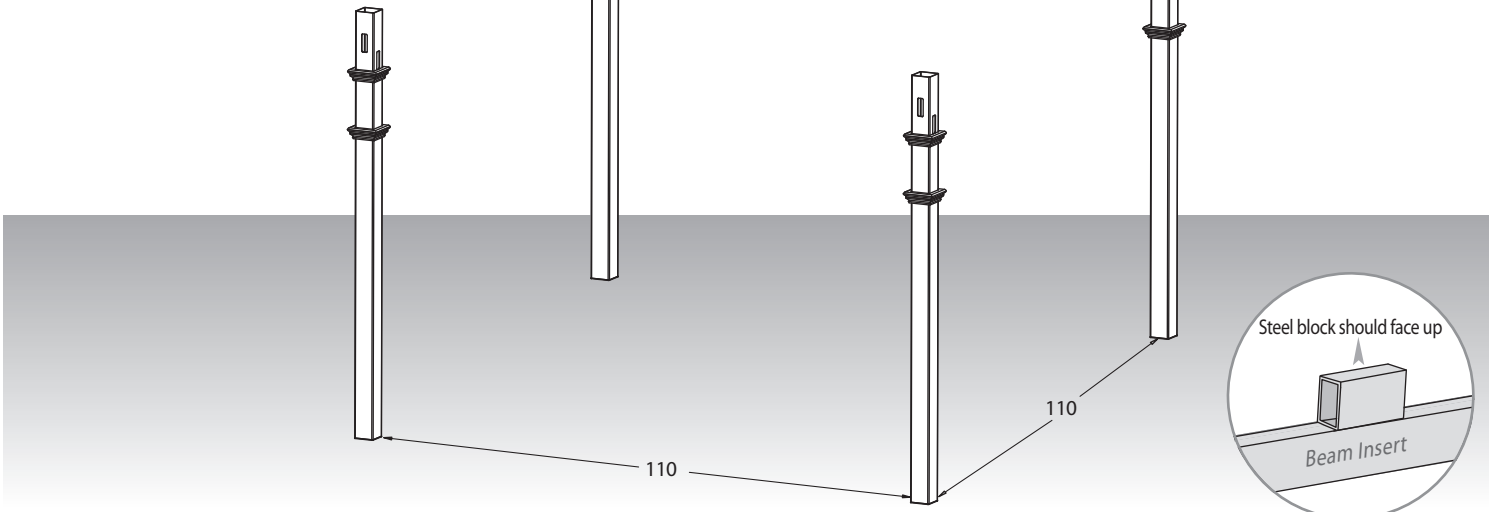
*Ensure that holes at top of column are orientated correctly for future beam and rafter placement.



At this stage, the columns should be properly installed as per the following illustration, with the columns 110" apart.

Also, notice that the holes at the top of each post should be facing the same direction.

Note: If you have base molding on your posts, measure above moldings as the measurement is to be from post to post.



STEP FOUR

Main Support Beam Assembly

1

Insert two short steel stiffener into one long steel stiffener to create full length piece. Repeat so you have two full main support beams.

2

Insert the end of the main support beam marked 'A' into the joiner. Install the joiners so that the side with the four holes are facing up. Push firmly until the extrusion bottoms out inside the joiner.

Please Note:

Be sure to orientate the main support beams correctly so the pre-drilled holes for future installation of rafter brackets is correct.

3

Insert one assembled steel stiffener (with steel block facing up), into the lower pocket of the main support beam past the joiner. Push until steel block hits the internal ribbing

4

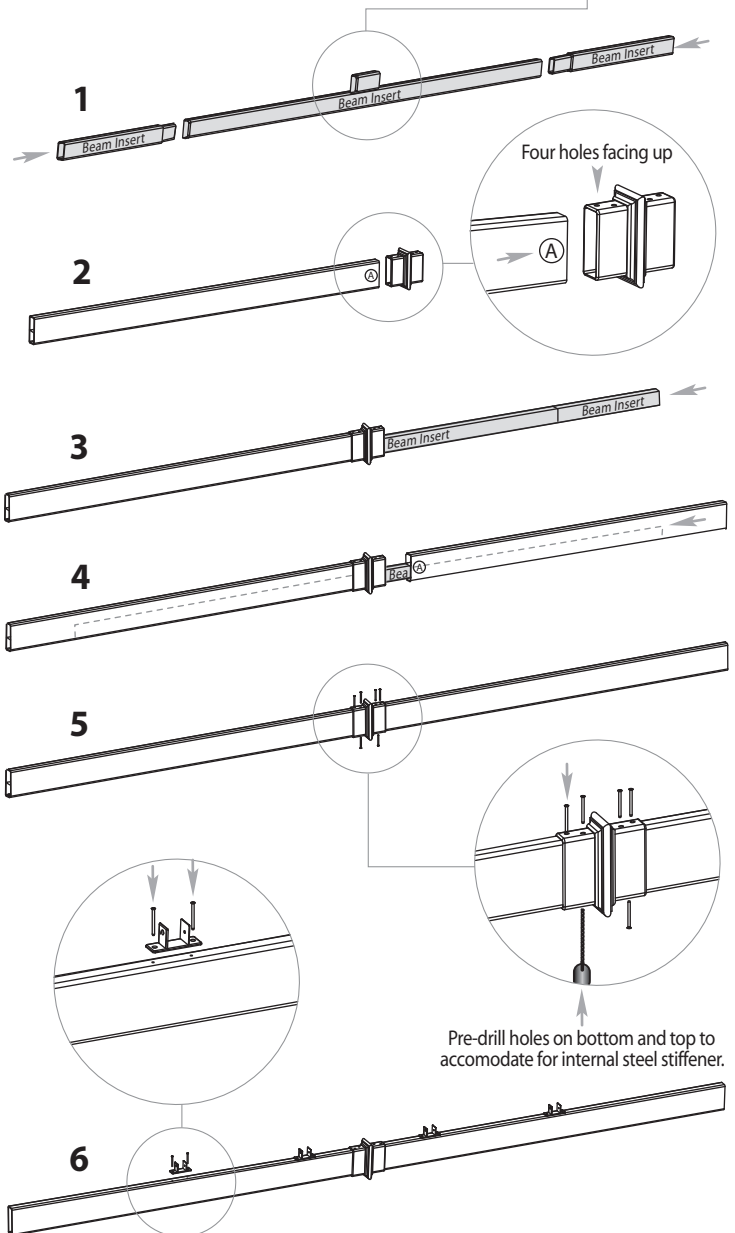
Slide the other end of the main support beam marked 'A' over the steel insert and into the joiner.

5

Screw the joiner to main support beams and steel insert using 1 1/2" screws. The bottom and top holes will need to be pre-drilled

6

Install the rafter brackets to the main beams using 5/8" screws. Follow the pre-drilled holes to identify locations.



STEP FIVE

Rafter Assembly

1

Insert the end of the rafter marked 'A' into a joiner. Install the joiners so that the side with the four holes is facing up. Push firmly so the extrusion bottoms out inside the joiner.

2

Insert one steel stiffener (with steel block facing up), into the lower pocket of the rafter. Push until steel block hits internal ribbing.

3

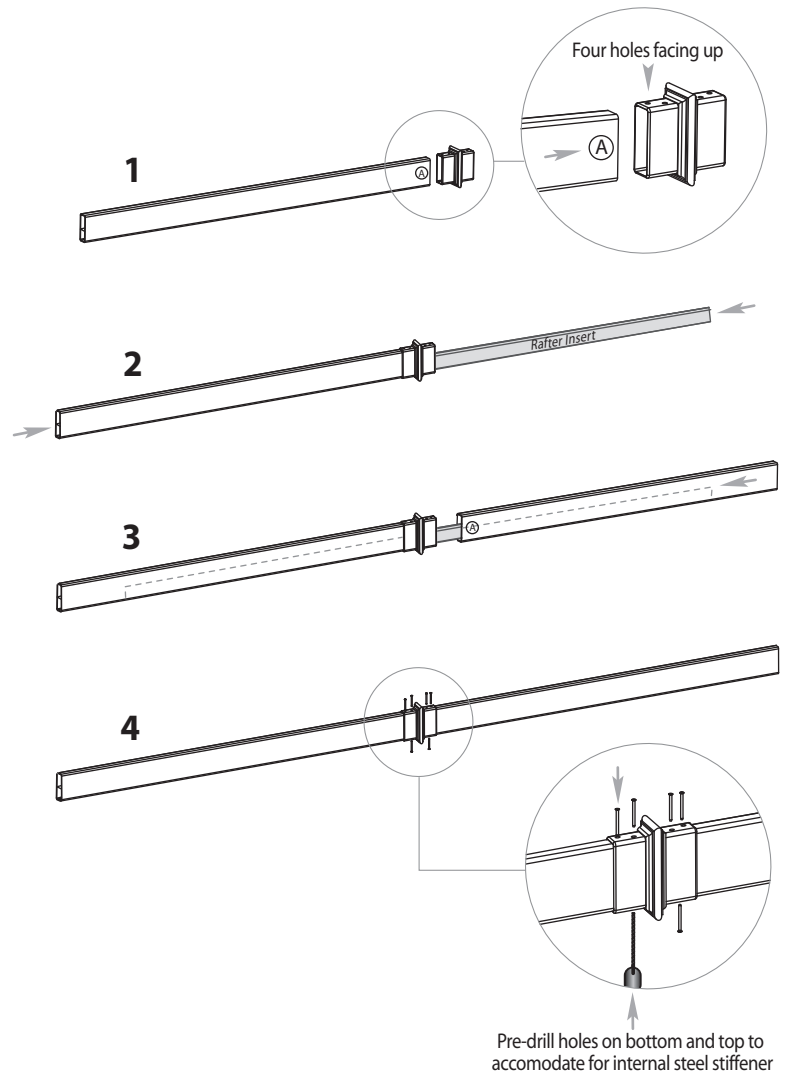
Slide the other end of rafter marked 'A' over the steel insert and into the joiner to create one full rafter. Repeat as necessary.

4

Screw the joiner to the rafters and steel inserts using 1 1/2" screws. The bottom and top holes will need to be pre-drilled (use drill bit provided).

5

Repeat steps 1 to 4 for the remaining 5 rafters.



STEP SIX

Main Support Beams & Rafter Placement

Using a helper and two ladders proceed to complete the following steps:

1

Slide the main support beam with rafter clips through both holes of the vinyl column (overshooting), and then back through both holes of the opposite column. Repeat for opposite main support beam.

Please Note:

The top of the vinyl columns may need to be tensioned in opposite directions to each other to allow the main support beams and rafters to be installed on a slight angle. The vinyl columns naturally allow some measure of flex.

2

Slide the two outer rafters through both holes of the vinyl column and through both holes of the opposite column.

3

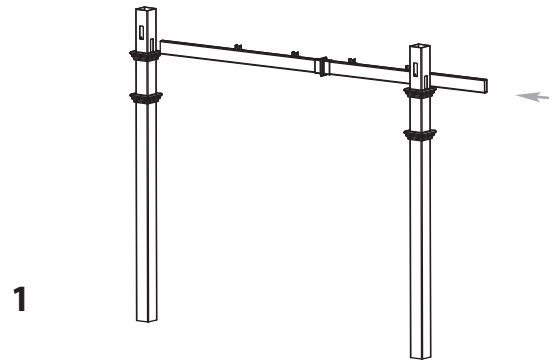
Final adjust the beams and rafters ensuring the overhang past the columns is equal to the eye. Using 4" screws lock the beams and rafters into position inside the columns by driving in 8 screws from the outside and 8 screws from the inside of each column. Pre-drill to accommodate for installation of screws into steel channel located in the lower pocket of the main beams.

4

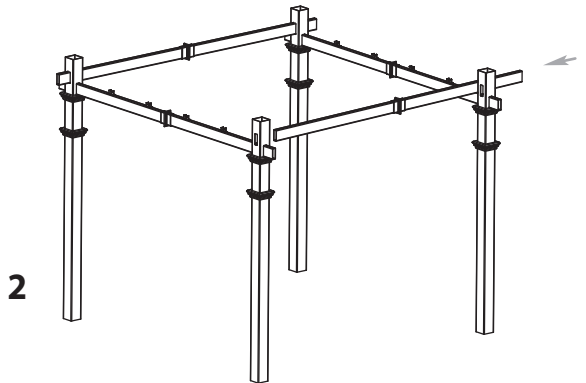
Place the remaining rafters in the front and rear rafter brackets.

5

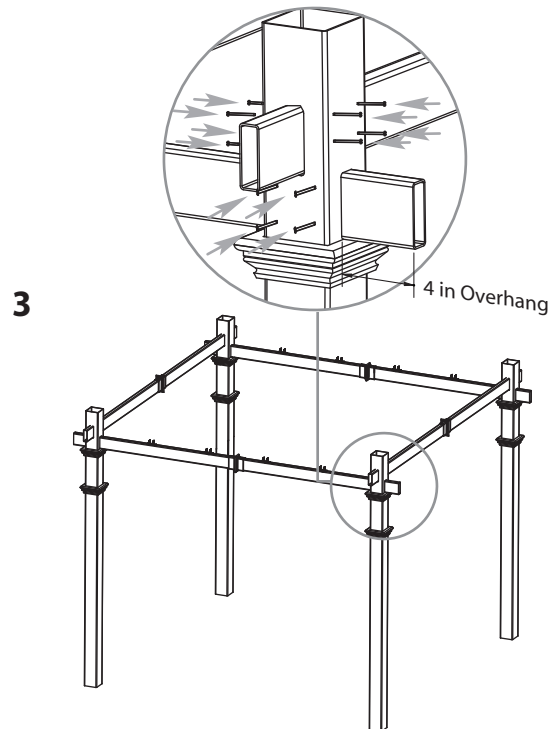
Complete a final adjustment of the remaining rafters. All spacing and overhangs past columns should be equal to the eye.



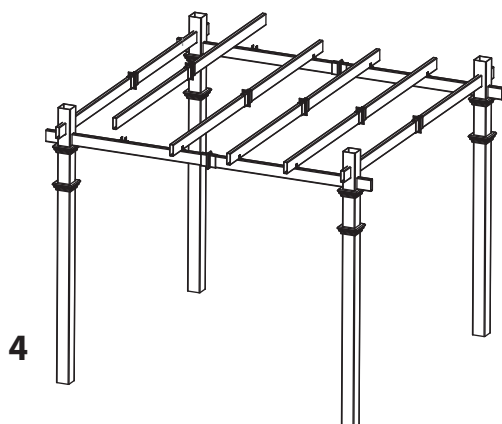
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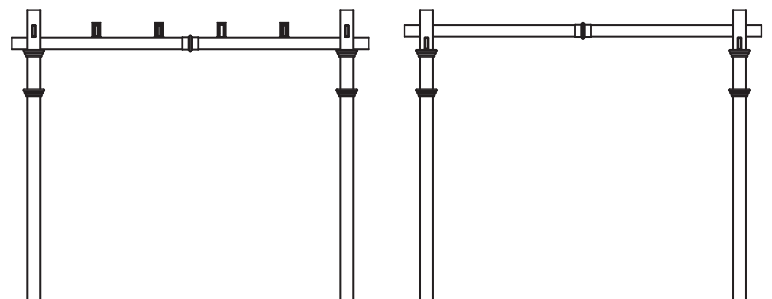
2



3



4



5

STEP SEVEN

Fastening Rafters & Caps

1

Using 5/8" self-auguring stainless steel screws attach the pergola rafters to the rafter brackets.

2

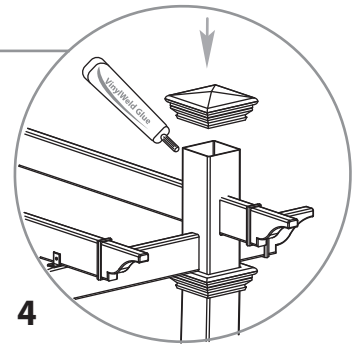
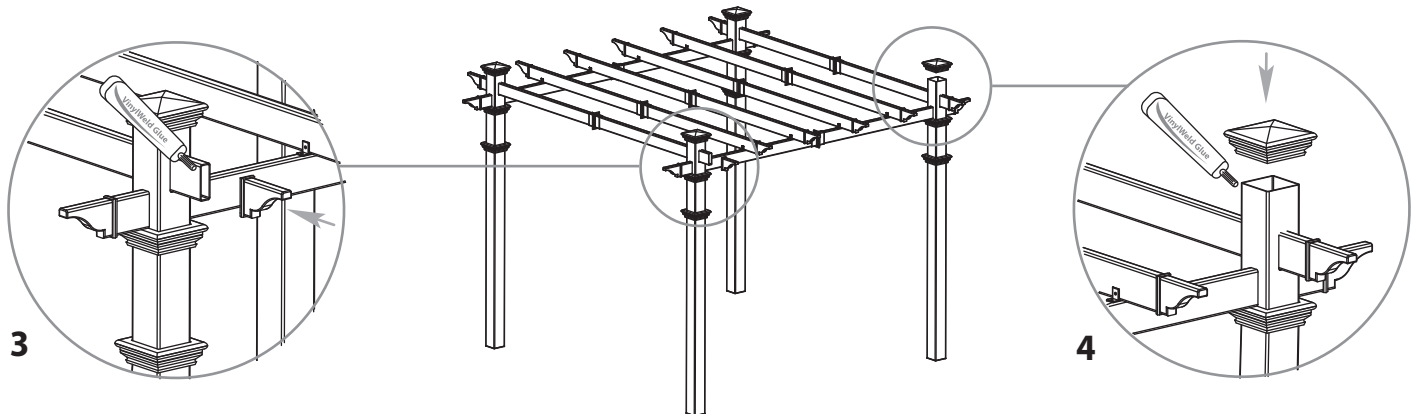
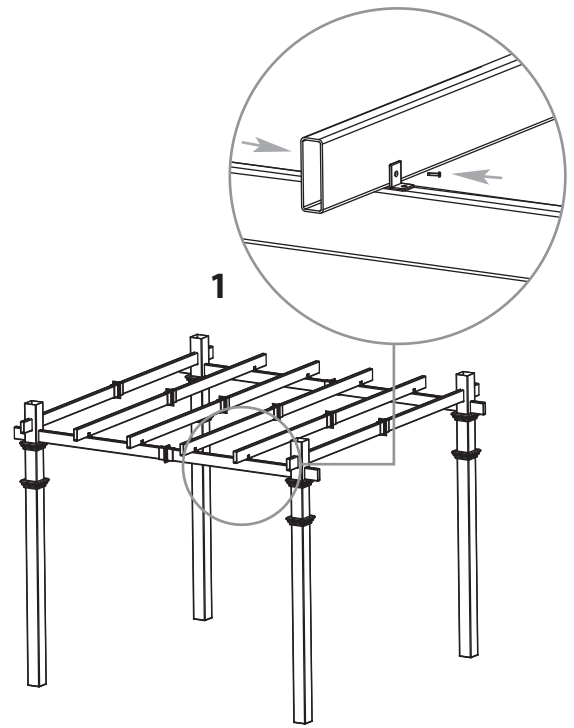
Install decorative pergola end caps using vinyl weld.

3

Install the post caps using vinyl weld.

4

Final position your post trims.



STEP EIGHT

Shade Slat Assembly

1

Assemble shade slats by first gluing the decorative end caps as shown, and then inserting the two slats into one joiner. Push firmly until extrusion bottoms out inside joiner. **No screws are necessary.**

Shade Slats Installation

The 1 1/2 x 1 1/2 shade slats are designed to be installed with 8 3/8" spacing between each slat.

Shade slats are designed to extend approximately 8 1/4" past the last rafter. Measurement includes the pre-installed pergola ends. Your goal is to ensure that all the shade slats overhang equally to the eye.

2

Install first shade slat adjacent to the top of the vinyl columns.

3

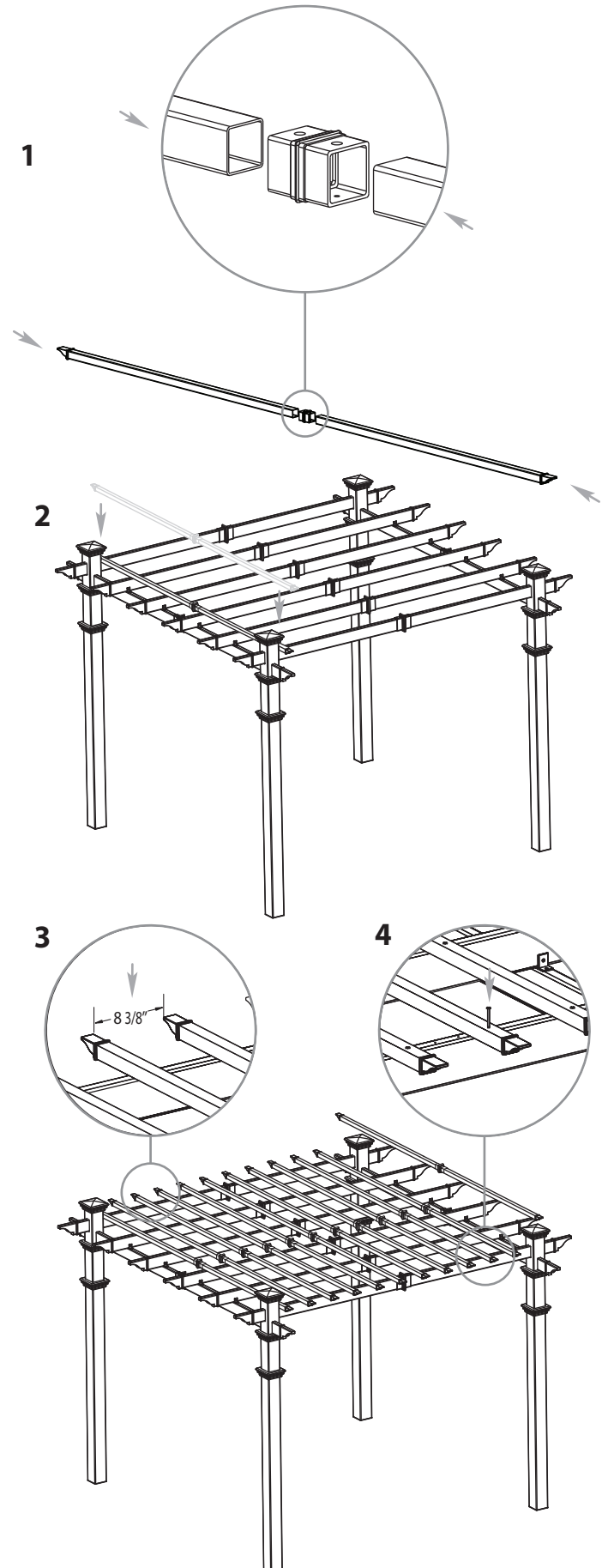
Install the rest of the shade slats at the 8 3/8" spacing.

4

Install one 2 1/2" screw at each intersection of rafter and shade slat.

Suggestions for Additional Shade as Necessary

- Contact New England Arbors regarding the possibility of purchasing an extra box of shade slats.
- White resin lattice in variety of shapes and sizes are available at your local lumberyard. Cut to size and fasten directly to the top of shade slats using stainless steel screws.
- In areas of extreme snow or wind load, do not use tight diamond privacy lattice.



Decorative Arch Kit Materials List

(Sold Separately)

Number of Shipping Boxes

The Decorative Arch Kit is shipped in one box.

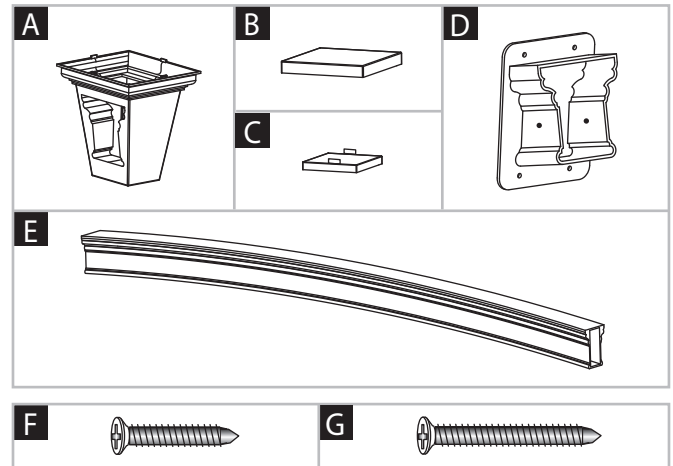
Check Box for These Contents

In the event of missing or defective parts please call our customer service dept. at **1 800 282 9346** (Mon. to Fri. 8:00 AM to 4:00 PM EST).

- A. Keystones (2)
- B. Keystone Lids (2)
- C. Keystone Bottom Plates (2)
- D. Post Mounting Brackets (4)
- E. Arches (4)

Hardware (in plastic bag)

- F. 1 1/2" Self-Augering Stainless Steel Screws (24) (for brackets)
- G. 2 1/2" Self-Augering Stainless Steel Screws (16) (for connecting arch to keystone)



Not to Scale

Decorative Arch Kit Assembly & Installation

1

Insert arches into keystone ensuring they terminate flush to the internal connector.

2

Fasten the top of the arch to the keystone by installing two 2 1/2" screws into the flanges on either side of the insert (2 on each side).

3

Invert the arch system and install two 2 1/2" screws on either side of the insert (2 on each side). This will connect the bottom of the arch to the keystone insert.

4

Seal the bottom hole on keystone by inserting the bottom plate as provided.

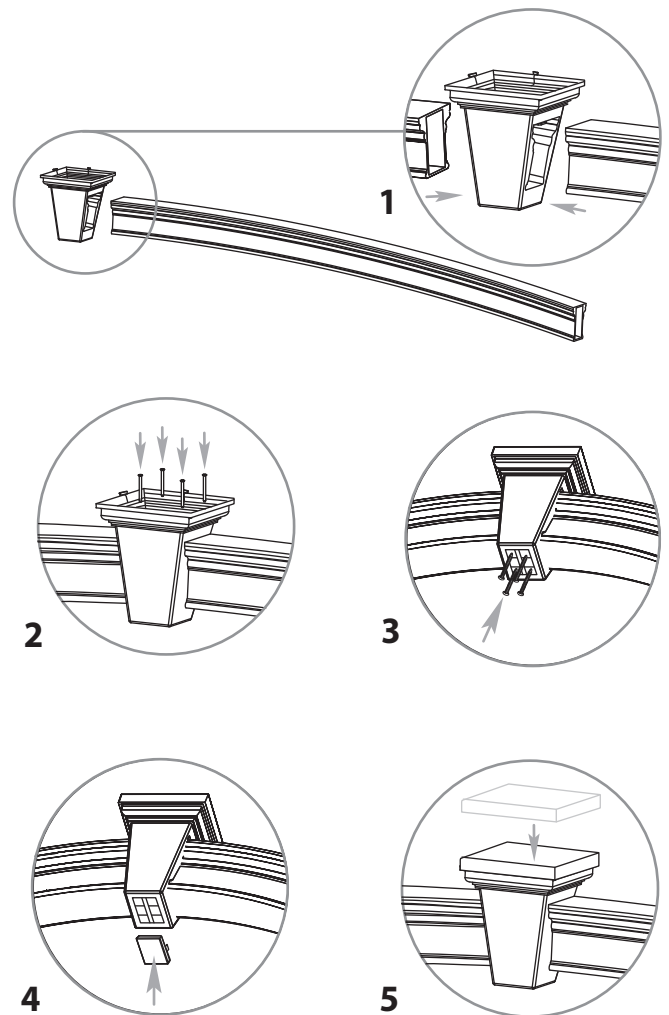
5

Install the top cap on keystone. Ensure the cap is pushed down firmly so the cap locks into position.

6

Repeat for other arch.

(Continued on following page...)



7

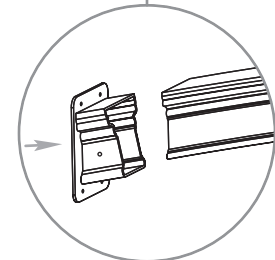
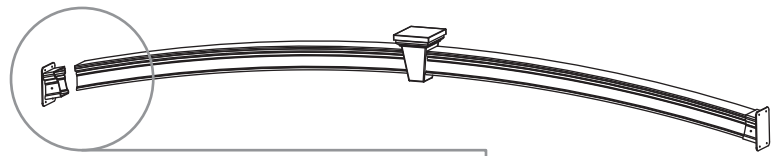
Install post mounting brackets over each end of arches and screw into place.

8

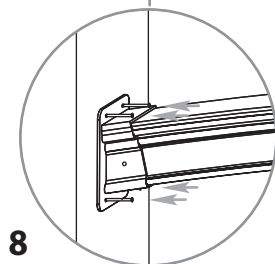
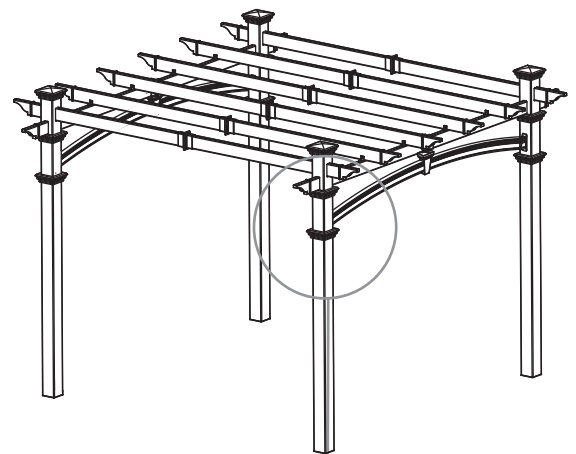
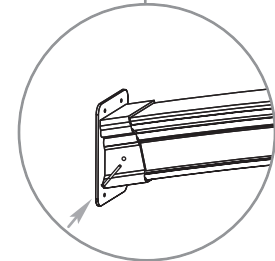
With a helper position the entire arch and screw brackets into place on the columns using a 1 1/2" screw. Keystone lid should sit flush under the joiner.

9

Repeat for other arch kit assembly.



7

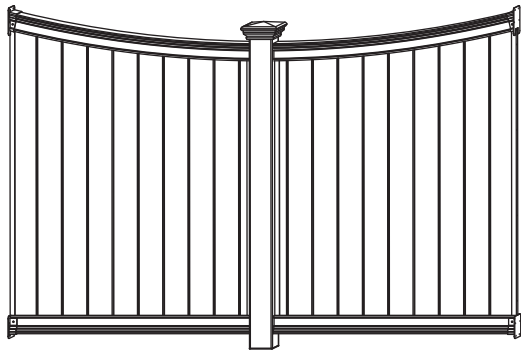


8

OPTIONAL

Privacy Fence Panel Materials List

(Sold Separately)



Number of Shipping Boxes

The Privacy Fence Panel is shipped in two boxes.

Check Boxes for These Contents

In the event of missing or defective parts please call our customer service dept. at **1 800 282 9346** (Mon. to Fri. 8:00 AM to 4:00 PM EST).

1. Post Cap (1)
2. Post (1)
3. U-Channel Long (2)
4. U-Channel Short (2)
5. Post Brackets for Arched Top Rail (2)
6. Post Brackets for Bottom Rail (2)
7. 4"x4" Internal Wood Post Guide (2)
8. Various Height Privacy Fence Board Panel (14)
9. Bottom Rails (2)
10. Arched Top Rails (2)

Hardware (in plastic bag)

- A. Vinyl Weld Glue (1)
- B. 5/8" Self Auguring Stainless Steel Screws for Bottom Rail Brackets (12)
- C. 5/8" Self Auguring Stainless Steel Screws for Top Rail Brackets (12)
- D. 5/8" Self Auguring Stainless Steel Screws for U-Channel (14)
- E. 1 1/2" Self Auguring Stainless Steel Screws for Middle Post (4)

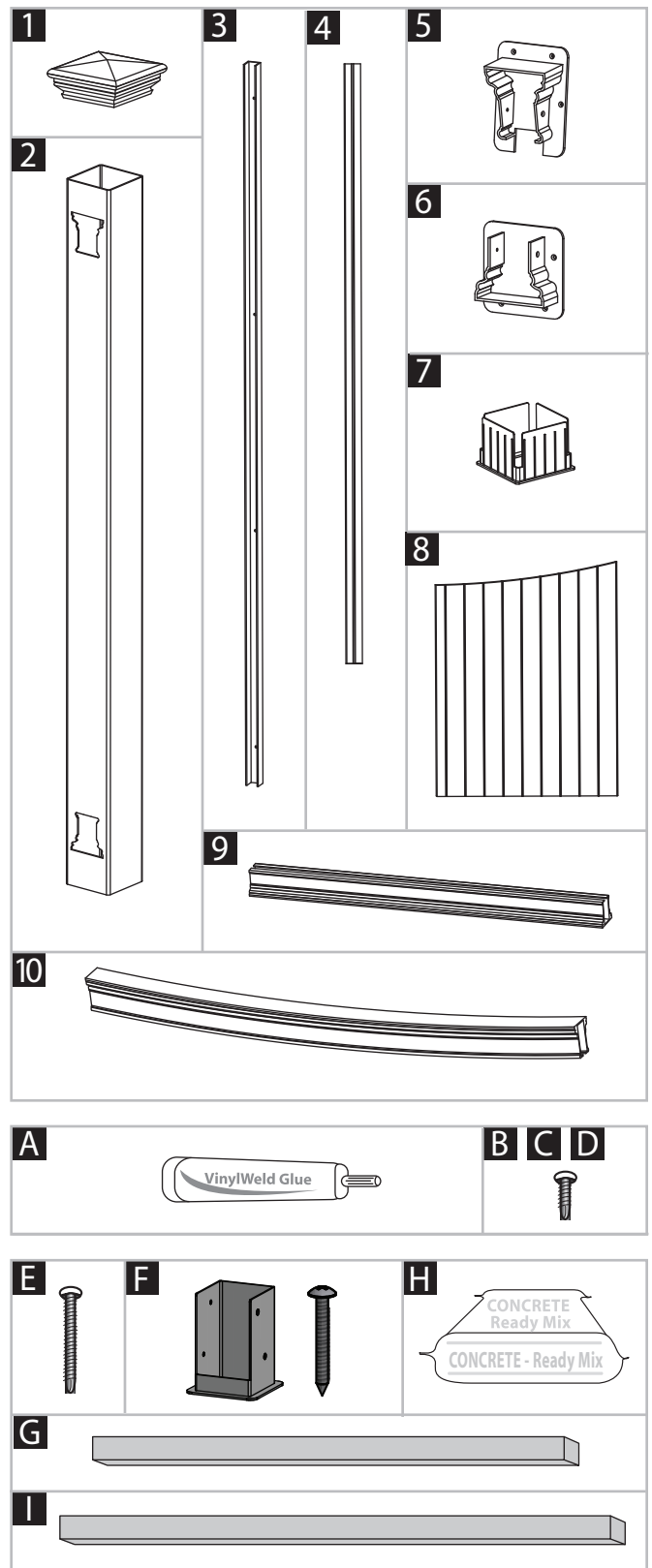
Extra Materials You will Need (Purchase Separately)

If Mounting Pergola on Concrete or Wood Deck

- F. Bolt Down Posts Bracket Including Mounting Hardware (Kit of 1)
- G. 4x4x67 1/2" Pressure-Treated Wood Posts (1) (purchase at local building center)

If Mounting Pergola in Ground

- H. Concrete Ready Mix (4) (purchase at local building center)
- I. 4x4x8 Pressure-Treated Wood Post (1) (purchase at local building center)



Not to Scale

Privacy Fence Panel Assembly & Installation

STEP ONE

Note: As mentioned on page 9, wall is not designed to fit pergola with base mold as custom cutting of pieces will be required.

Install the Middle Post

1

Measure and mark out the location of the wood 4x4 post using string or chalk line. Center of 4x4 wood post should be located between two pergola columns.

Please Note:

Follow the same applicable post instruction method as illustrated on pages 7 or 8 of this instruction guide.

2

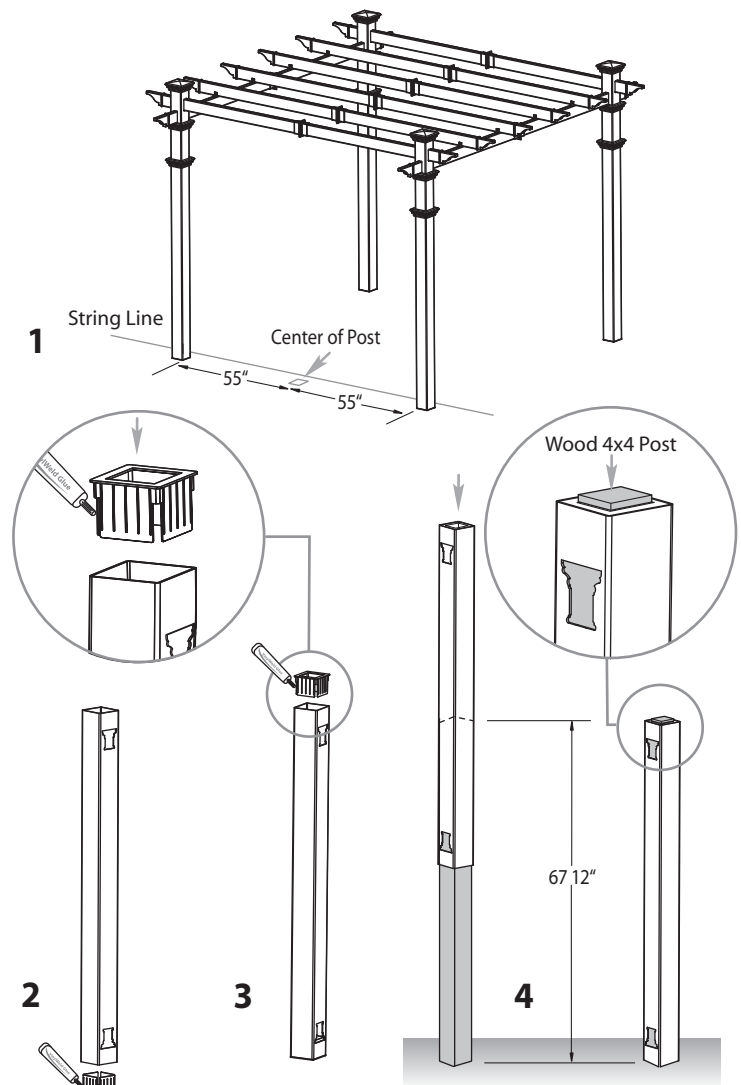
Using the vinyl weld glue insert the One Way 4"x4" Internal Wood Post Guide in the bottom of the post. This step is only applicable if your wood 4x4 post are embedded into the ground. If your pergola is going to be installed on wood or concrete surface, please dispose of this piece.

3

Using the vinyl weld glue insert the One-Way 4"x4" Internal Wood Post Guide at the top of the post.

4

Guide the vinyl post over the wood post. The wood post should stop about 67 1/2" above the ground or concrete patio. This should allow the wood post to extend thru the One-Way 4x4 Internal Wood Post Guide at the top.



STEP TWO

Install Fence

1

Install post bracket on one end of the bottom rail using 5/8" screws provided.

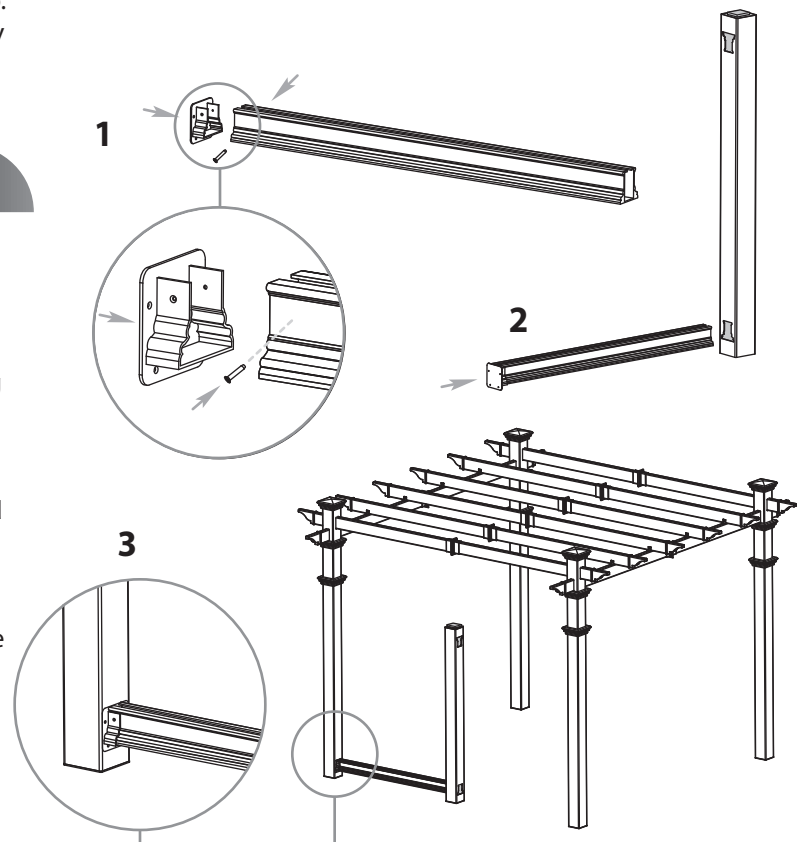
2

Slide the opposite end of the bottom rail into the routed hole on the post.

3

Using a level mark the position of the bracket on the opposite post and screw bracket into place.

(continued on following page...)



Install Fence (continued)

4

Install long and short u-channel accordingly in the middle of the vinyl posts using 5/8" screws provided.

5

Install the tongue and groove privacy board working from the tallest board to the shortest. The first board should sit flush inside the u-channel.

6

Install the post bracket on one end of the arched rail. After inserting into the top routed hole on the post, begin to "walk" the rail down into place over the tongue and groove privacy board.

7

Fasten the arch post bracket to the post using 5/8" screws provided.

8

Repeat for installation of the other fence panel.

9

Secure the vinyl post to the internal wood post as per illustrated on page 9 of this manual step #8. Level and adjust as necessary before fastening into place using the provided 1 1/2" screw.

10

Install the post cap using vinyl weld.

