

# Pergolas 101

<u>Headers</u> (beams, support rails) - Single or Double support beam, runs the width of the unit. 2"x8" profile lagged or install into post system and receives brackets for rafters.

<u>Rafters</u> (joists) – Runs perpendicular to Headers as the projection. 2"x6" profile secured to rafter brackets or stringers.

<u>Purlins</u> (slats, topper, lattice) – Runs the width of the unit, sits perpendicular to rafters. 7/8"x3" profile secured to rafter with screws and screw caps.

<u>Width</u> - Runs with the headers and purlins and in most cases the longer size.

Projection – Runs with the rafters.



All units measure width x projection. These are on center post measurements, therefore will leave an overhang for the canopy. These are the extensions past the post center. See the overhang chart for the true canopy size. S:\USA Vinyl\Customer Service Sales\Selling Information\Outdoor Products\Pergolas\Width x Projection Diagram

# Pergola Kits USA offers two different Premium Vinyl pergola kits -

Regal – The Regal is a Single Beam Kit, meaning that there is one 2"X8" header that runs through the pergola posts. Not tested to any standards.

- 5" post cannot be changed to a different option. This is because the post is routed to receive the 2"X8" header and rafter though the post.
- Can span 12' o.c. wide before an additional post is needed.

<u>Hampton Premium Vinyl</u> – The Hampton Premium Vinyl is a Double beam kit, meaning that there are 2"X8" headers that lag to the inside and out of the pergola posts. This kit is engineered tested to withstand wind up to 140mph and snow loads up to 4'.

- Offered in 5" and 8" square posts and 8" round column.
- Can span 16' o.c. wide before an additional post is needed.
- Reinforced with aluminum in each rafter and header.
- Meets the Florida Building Code (SBC 2007), ASCE 7-05 minimum design loads for buildings and other structures.

## **Our Kits**

- Are available in three colors White, Tan and Khaki
- Are available in attached or freestanding units.
- Can install onto concrete or into concrete footers.
- Includes all the necessary hardware for installing, including the wood post and ledger for attached units (customer is to provide pressure treated wood for 2"X8" ledger and hardware for attaching ledger to home or building)
- Are defined as width x projection, projection available up to 16' o.c..
- Width, projection and height can be modified on site.
- Pre sized kits are available in 8', 10', 12', 14', 16' width and projection.
- Headers are spaced 4" apart on a double beam.
- Rafters are spaced about 24" apart.
- Purlins are spaced about 3" apart.

# Will the unit be attached or freestanding?

- Attached would allow the pergola to attach to a home or building.
- Attached unit would only be available with headers and posts on one side of the pergola.
- Freestanding unit would be a unit that does not attach to a home or building.
- Freestanding unit would be available with headers and posts on both sides of the pergola.

# Single beam or double beam?

• If a customer is unsure, double beam is the way to go! Double beam unit is engineered tested and typically does not cost too much more than the Single beam.

## What is the width of the unit?

- The width is the run of the 2"X8" headers and 7/8"X3" purlins.
- Double beam width will allow a 20" overhang on both sides for an overall canopy ie:16' center will be an overall canopy of 19' 4" width.
- Single beam width will allow a 15" overhang on both sides for an overall canopy ie:16' center will be an overall canopy of 18 6" width.

# What is the projection of the unit?

- The projection is the run of the 2"X6" rafters.
- Projection cannot exceed 16' on center.
- Double beam projection will allow a 15" overhang on both sides for an overall canopy ie:16' center will be a 18' 6" projection. (only calculate one side for an attached unit)
- Single beam projection will allow a 12" overhang on both sides for an overall canopy ie:16' center will be a 18' projection. (only calculate one side for an attached unit)
- See chart for sizes

# Installing onto concrete or installing into ground?

- Concrete installation will be a post kit that includes a concrete mount for installing onto concrete with wood post, screws and fastners.
- In ground installation will be a post kit that includes a wood post that will install into the ground at least 3'.

# Height of pergola, from ground to bottom of headers?

- The post kits are available in 8' and 10' heights?
- Height can be modified on site

## **Custom?**

• Call us (1-800-403-9259) if you are interested in a custom size.

See next page for FAQ's

# FAQ

## What is the difference between a Vinyl Pergola and Vinyl Patio Cover?

Really nothing, but some people search for Vinyl Pergolas and some people search for Vinyl Patio covers, but they are the exact same thing.

## How are your pergolas measured?

Our 16' Width x 16' Projection Freestanding Pergola size is the actual location of the posts center to center. The top dimension of the 16' Width x 16' Projection would actually be 19' 4.5" Width by 18' 6" Projection (The Bradenton<sup>TM</sup>).

## Do you have any Vinyl Pergolas that are tested for wind load and snow load?

The Hampton Premium Vinyl Pergola is independently tested by a third-party engineering firm. It can be installed so it can withstand 140MPH wind loads (exposure 'C') and withstand 4 feet of snow loads. If you need a raised seal engineering report for your local building department, the cost is \$50.00.

## Are your components structural?

All of our 2" x 8" headers are hollow with structural aluminum inserts in them. All of our rafters are hollow with structural aluminum inserts in them. Rafters 10' and below for the Hampton use double ribbed extra strong 2" x 6" extrusions – structural aluminum is not needed in 10' and lower Rafter Projections – as always, we can customize anything you need!

## Can you make custom sizes?

We can make custom sizes, but our customers like the versatility of being able to cut down on site. For example, you want a 16' Wide x 15' Projection Vinyl Pergola, you would typically purchase a standard 16' projection x 16' wide pergola and trim down to your custom site. It is easy and gives you the flexibility to make changes on site! Let us know what you want and we will make it for you!

#### Is there a variation in the number of shade purlins that come with different manufacturers?

The spacing of the slats and the size of the purlins vary by manufacturer. The Hampton Pergolas use 3" wide purlins that are 3" apart. If you would like a different size, we also stock 1.5" x 1.5" and 7/8" x 1.5" purlins. Remember, the 3" wide purlins will give you adequate shade.

#### Does the price of your Vinyl Pergola's include everything?

We include everything! The only items you may need is concrete and/or a ledger board insert and hardware for attaching the pergola to a building.