

Frequently Asked Questions and Common Mistakes to Avoid When Buying a Pergola

Pergolas are significant investments that add value and enjoyment to open spaces of all sizes and shapes. The choices are almost endless and it is easy to make some common mistakes that cause unnecessary headaches and costs. Below are the main pitfalls to avoid.

1. How can I tell if something that looks great now, will still look beautiful in 5 or 10 years?

Start with the right material. Most pergolas are built from Wood, PVC/Vinyl, Steel/Aluminum or Concrete. Wood is the most popular material. Your wood choice will determine longevity and longterm maintenance (see Appendix A for more).

Warranties are a good guide to quality. If the manufacturer won't back the pergola more than a couple years, it will not last. Affordability is a factor of both price and product life-span. The chart below is a good general wood species guide:



Most Common Woods Available	Cost	Durability	Attractiveness	Source	Notes and Recommendations
Imported Hardwoods	High	High	High	Overseas	Excellent Quality. Possible ecological issues.
Cedar	Med/High	Med/High	High	US/Canada	Good Quality. Quality varies significantly amongst suppliers.
Teak	Med/High	High	High	Overseas	Excellent Quality. Quality varies significantly amongst suppliers.
California Redwood	High	High	High	U.S. (confirm <u>ecologically harvested</u>)	Beautiful. Best Redwood has unbeatable decay resistance.
Pressure Treated	Low/Med	Med/High	Low/Med	U.S.	Inexpensive. Toxicity concerns long-term.
Pine/Fir/Hemlock	Low/Med	Low/Med	Med/High	U.S.	Inexpensive. High maintenance costs.

Some other wood options include Synthetic woods, Laminates, Gluelams, Bamboo and Pole pergolas—see appendix D. Choose a material that does not clash with what is nearby. For example, in hot, humid climates with nearby concrete structures, a concrete pergola may be a good choice. Or, if you are considering a pergola for a house with a wood deck or siding, matching the existing wood appearance may be a top concern. If you'd like more information about wood quality or other alternative materials, please call or email us.

2. Once every few years, we get strong wind storms. How can I be sure my pergola won't get damaged by weather?

Thicker structures tend to last longer. Compare wood thickness and the quality and amount of fasteners. Shipping weight is a reliable indicator of the heft of competing products.

Notched pergolas are stronger, longer-lasting structures with greater wind resistance. If buying a wood pergola, ask if it is partially or fully notched. Notching creates interlocking joints but it is a time consuming manufacturing process because all the notches must line up. Most manufacturers skimp on notching partially or completely. Pergolas with all unions notched create a web-effect that distributes wind and weight stresses to lessen stress points.

The quality of your anchoring hardware is critical. For details, see appendix B.

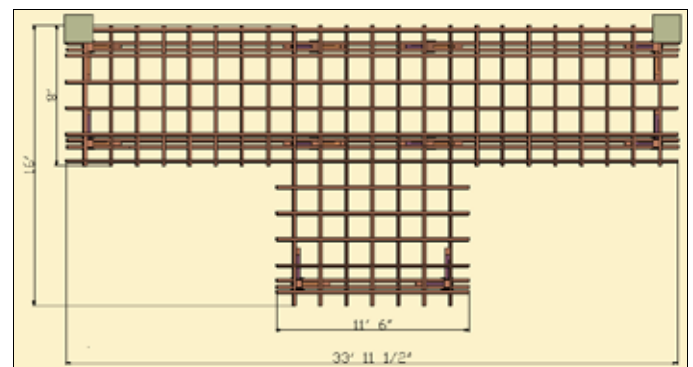
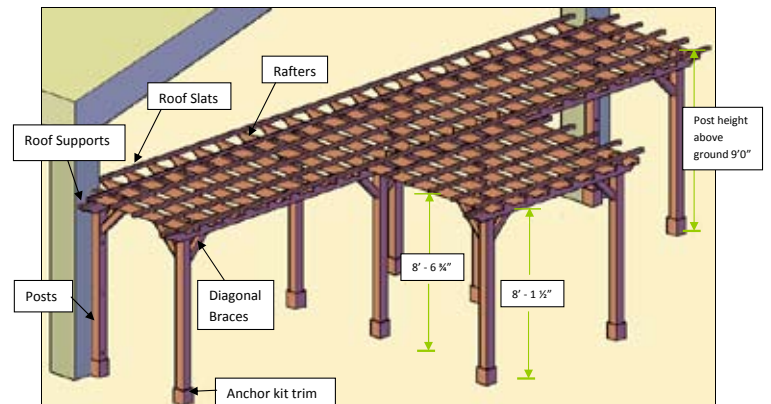
Rain and your pergola: In dry climates like the Southwestern U.S. you can often get by with less expensive materials that will last longer than in moist or harsh climates. But, in most areas of the U.S. and Canada, you'll need to think about moisture and long-term decay issues. Drier areas are more forgiving long-term. Extreme heat areas also require better quality materials.

3. All pergolas look good, but how do I know they'll work for my situation without buying first?

Can I count on long-term support after buying? What if your oak tree falls on part of your pergola. Do you have to throw out your expensive pergola or can you get parts? Before buying, make sure you can get replacement parts in future years even if your pergola is custom sized.

Avoid sizing errors: A common mistake is to assume the positioning of the 4 corner posts is the size of the pergola being offered. For example, if you want your four corner posts to sit on the corner of your brand new concrete pad that is 10' x 12', and you order a 10' x 12' pergola, your posts will be set in from the edge you had hoped the posts would sit at. The reason is pergolas are always sized based on Roof size. In most cases, the posts are recessed back from the roof edge anywhere from a few inches to a couple feet depending on the design.

Can I get the size and details I need? Few manufacturers offer custom design or sizing, but it is out there. If you have a special spot that needs a custom touch, look around on the web. The best custom houses offer Autocad drawings as a way to double check everything and make sure all measurements and details are agreed to in writing ahead of time. An example set of autocad drawings for a custom job look like this:



Will my existing concrete pad, balcony or deck hold my pergola long-term? If it was built correctly, your existing outdoor flooring should hold up fine. If in doubt, call the pergola manufacturer. Customer service quality varies greatly among manufacturers. Look for a manufacturer that has been in business for at least 5 years and don't settle for incomplete answers. Incomplete answers are a sure sign of future trouble. If they don't have experienced customer service personnel to answer all your questions, move on.

Can I put the pergola up once I get it? Get the [assembly instructions](#) before buying. Most pergolas are 1 day installs, but be sure you can handle the job or have someone that can do it. The better manufacturers provide assembly instructions either via email or on their sites.

Should I have the pergola attached to my house or free standing? Most pergolas are free standing. If you are considering an attached structure, please see appendix C below. Attached pergolas are always custom jobs, like the one at right done with only one post:



4. Final points to not trip up on....

Pergolas create a gathering point in the yard, they add shade and structure and value to your home. Before spending thousands on a pergola, you want to be certain what you buy will work for you when it arrives. Once you've made the decision on materials, size and design, double and triple check the orientation of the pergola and the dimensions. It is a good idea to mark the ground with the position of the posts before buying. Walk towards it and envision it in place. Make sure you've oriented it the way that makes the most sense for foot traffic and for the movement of the sun. Keep in mind where the sun usually is in the morning and the afternoons and how it will shade the area. Some pergola manufacturers offer different timber spacing options for additional shade. For example, below are typical rafter and slat spacing options:



Call around and make sure you work with someone that will give you what you need for long-term enjoyment. If in doubt, find a manufacturer that will include drawings with your purchase. With drawings in hand, you can study the spot and make sure everything works before starting construction. Most reputable manufacturers will allow you to send in pictures of your backyard and have someone knowledgeable on staff walk you through any questions. A good percentage of pergola installs require some customization. Make sure the company you choose knows what they are talking about and can answer your questions completely.



APPENDIX A: Wood Grades & Heartwood

All wood species have wood grades within the species itself. Wood species also vary greatly in weather decay resistance, pricing and appearance. Usually, less expensive wood equals not long lasting. If the manufacturer does not specify a wood grade, it is a low (or at best a medium) grade for the species offered. High grade wood is clearly mentioned and is always at a premium. Heartwood is the most durable portion of any tree's wood. If the manufacturer cannot tell you if their wood is allheartwood, assume it is not heartwood and will not last. Knots often add a rustic flavor and in moderation do not affect longevity.

APPENDIX B: Assembly & Anchoring Hardware



Most manufacturers provide some or all the assembly and anchoring hardware. A couple manufacturers custom make extra heavy duty anchoring hardware that exceeds those available from hardware stores. Make sure the type of steel is specified. If not specified, odds are it is galvanized or standard steel. Galvanized or standard steel will rust and stain your structure. Stainless steel is the best choice for outdoor applications if you do not want rust and stain or replacement issues. If you live within a mile of the ocean, the only way to avoid rust and stain is to go with stainless steel hardware. Galvanized will rust within a few years. Even away from the ocean, galvanized and steel anchors will eventually need replacing or maintenance. Brass is another low maintenance option.

APPENDIX C: Attached Pergolas

If you're considering an attached pergola, you'll need to consider how your house was constructed and how the pergola will be anchored to the side of the house. Attached pergolas are sometimes preferable because they use less posts and create immediate transition spaces from indoors to outdoors. They tend to require more attention to detail prior to purchase to avoid obstacles (eaves, exterior lighting and to be sure they line up with sliding doors and windows). A couple manufacturers offer custom attached pergolas. Be sure to find a knowledgeable customer service person to walk you through the details. Go directly to the manufacturer for best selection and service. There are hundreds of pergola websites. Most are resellers of a few dozen manufacturers. You will often receive better service, pricing, support and selection by dealing directly with an experienced busy manufacturer.



APPENDIX D: More on Wood Types

Pressure treated lumber is inexpensive and long-lasting, but it is toxic to the touch and not too attractive.

Pine & Fir are also relatively inexpensive, but will not last more than 5 to 10 years without significant ongoing maintenance.

Timber poles are attractive rustic options that are inexpensive, but in most cases will also not last more than a decade.

PVC, Vinyl and other synthetic woods vary greatly in pricing and appearance. They often are longlasting, but they are not recommended for very hot climates (Arizona...) where these types of products have been known to sag when overly heated.

Bamboo, if you can find it, is a relatively well priced option. Bamboo is finger-jointed together (glued small pieces into larger timbers) and with some maintenance may last much longer than a decade.

Imported Exotic Hardwoods tend to be pricey, but are long lasting and attractive options. If you are ecologically minded, make sure to buy from a "certified sustainably harvested" timber source. The best of the international certification bodies is FSC (Forest Stewardship Council).

Oak is available in some parts of the country. It tends to be expensive, very strong and beautiful. But, it is not a wood species with significant decay resistance and requires regular maintenance outdoors.

Teak is an attractive and moderately priced long lasting alternative. Tends to be less expensive than other imported hardwoods. Teak quality varies. It is grown in plantations in Central America. In general, the longer it takes to grow, the better its appearance and longevity. Teak plantations can grow timber in 20 to 80 year rotations.

Cedar is a commonly available, attractive and moderately priced long lasting alternative. Tends to be less costly than Teak or the Exotic Hardwoods. Like all woods, the quality varies.

California Redwood is a higher priced, attractive and very long lasting alternative. Cost is a bit higher than Cedar or Teak in most cases, but it has greater decay resistance. Like all woods, the older the tree the boards come from, the higher the quality is in general. The best grades of Redwood have the greatest decay resistance of any wood available on the market.