# How to Buy the Best Home-Center Lumber

Most DIYers shop for lumber at the home center, but with so many choices in multiple aisles, how do you know what boards to choose? Here's an overview of the boards you can get, plus some helpful tips for selecting the best ones.

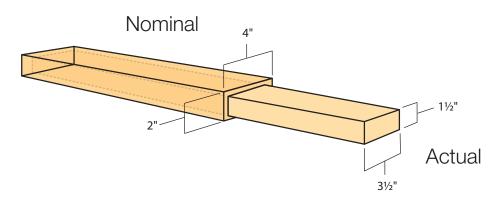
# What sizes of boards can I buy?

Lumber sold in a hardware store is all milled to standard thicknesses and widths. It's commonly referred to as "1-by" or "2-by" for the thickness in inches, followed by the width in inches. So, you'll hear lumber referred to as 1x6 (one-by-six), 2x4 (two-by-four), etc.

This can be confusing because those numbers don't describe the true dimensions of the boards. 1x6 or 2x4 refers to the "nominal" thickness and width, which are greater than the "actual" thickness and width. The chart below shows the difference between nominal and actual sizes of common boards.

Here's why that's important for your projects:

- If you're using a project plan, the materials list might say you need a 1x4 board (the nominal size), but the dimensions in the plan will show 3/4" x 31/2" (the actual size).
- If you're drawing up your own project, be sure to use the actual dimensions. If you accidentally design your project using the nominal dimensions, it may not come together as you had planned



Nominal	Actual
1" x 2"	34" x 1½"
1" x 3"	34" x 2½"
1" x 4"	<sup>3</sup> / <sub>4</sub> " x 3½"
1" x 6"	<sup>3</sup> / <sub>4</sub> " x 5½"
1" x 8"	3/4" x 71/4"
2" x 2"	1½" x 1½"
2" x 4"	1½" x 3½"
2" x 6"	1½" x 5½"
2" x 8"	1½" x 7¼"
4" x 4"	3½" x 3½"
6" x 6"	5½" x 5½"

#### Construction lumber

Home centers have several aisles filled with stacks of wall studs and other "2-by" boards up to 12" wide. These boards are made for building homes and other structures. Since they're usually hidden inside walls or under floors, construction boards don't have to be pretty. They're rated for strength and size — not for appearance.

Usually made from pine, or one of several similar species grouped as "whitewood," 2-by dimensional boards can still be useful for DIY projects. They're readily available, relatively inexpensive, and easy to work with.

The key to success with construction lumber is taking extra time to sort through the stacks and find the best-looking boards with the fewest defects. (More on common wood defects later.)



#### Pine and Whitewood

Common Sizes	2x2, 2x3, 2x4, 2x6, 2x8, 2x10, 2x12
Softwood/Hardwood	Softwood
Color	Light off-white to yellow
Appearance	Semi-smooth surfaces, rounded edges, has knots and imperfections, may have gouges, grading stamps
Common DIY Uses	Structures, farmhouse- and rustic-style furniture, storage & utility projects
Workability	Easy to cut, drill, and glue; holds coarse-thread screws and nails
Cost	<b>\$</b> \$\$\$\$

# Appearance boards

In a separate aisle from construction lumber, you'll find better-quality boards referred to as "appearance boards." As the name implies, these boards are made to have a much better appearance. You'll usually find them standing vertically (rather than stacked like construction lumber) to help prevent damage.

Appearance boards aren't meant for building structures. They're great for things like interior trim and cabinets, as well as DIY and woodworking projects. Because of this, appearance boards have smooth surfaces and crisp edges. Home centers offer appearance boards in several typical softwood and hardwood species.

Softwoods used to be most commonly used for utility projects and DIY storage. But as farmhouse and rustic styles have become popular, softwoods are also used for building furniture and other woodworking projects. Though there are many kinds of softwoods, pine or "whitewood" are the most common in hardware stores.

If you want to create higher-end furniture or built-ins, you may want to build using hardwood. Though not all hardwoods are "hard," they are generally denser and more durable than softwoods. Oak, poplar, and maple are common among home-center hardwoods. Some stores offer others such as aspen, cherry, or walnut.



#### Common pine and whitewood

For rustic furniture or utility projects, the classic "knotty pine" look remains popular. It's also an economical choice because these are usually the lowest-priced appearance boards. Depending on where you shop, these boards may be pine or just "whitewood." That means they could be pine, spruce, fir, or one of several similar species.

Common Sizes	1x2, 1x3, 1x4, 1x6, 1x8, 1x10, 1x12
Softwood/Hardwood	Softwood
Color	Off-white to light tan
Appearance	Smooth surfaces, square edges, has knots and imperfections, may have gouges
Common DIY Uses	Farmhouse- and rustic-style furniture, storage & utility projects
Workability	Easy to cut, drill, and glue; holds coarse-thread screws or nails
Cost	<b>\$</b> \$\$\$\$



# Premium pine

Home centers also carry a higher grade of pine, which is usually labeled "select," "premium," or "clear." This pine is free from knots and other internal imperfections, so it's great for creating a higher-end look at a cost slightly lower than hardwoods. Clear pine is much more expensive than common pine, often costing three times as much or more.

Common Sizes	1x2, 1x3, 1x4, 1x6, 1x8, 1x10, 1x12
Softwood/Hardwood	Softwood
Color	Medium to dark tan
Appearance	Smooth surfaces, square edges, pronounced grain pattern
Common DIY Uses	Furniture, shelving, tables, built-ins (especially painted)
Workability	Easy to cut, drill, and glue; holds coarse-thread screws or nails
Cost	<b>\$\$\$</b> \$\$



# **Poplar**

Common Sizes	1x2, 1x3, 1x4, 1x6, 1x8, 1x10, 1x12
Softwood/Hardwood	* Hardwood
Color	White with areas of yellow, gray, and green
Appearance	Smooth surfaces, square edges, subtle grain pattern, may have large areas that are darker toned
Common DIY Uses	Cabinets, built-ins, painted furniture, shelving
Workability	Relatively to cut, holds coarse-thread screws well but may require pilot holes to prevent splitting, glues well
Cost	\$\$\$\$\$



# Oak

Common Sizes	1x2, 1x3, 1x4, 1x6, 1x8, 1x10, 1x12
Softwood/Hardwood	Hardwood
Color	Light to medium brown
Appearance	Smooth surfaces, square edges, pronounced, attractive grain, often with an arched shape on the board faces
Common DIY Uses	Traditional furniture, trim and millwork, cabinets, bookcases, built-ins
Workability	Slightly difficult to cut, holds fine-thread screws well but may require pilot holes to prevent splitting, glues well
Cost	\$\$\$\$\$



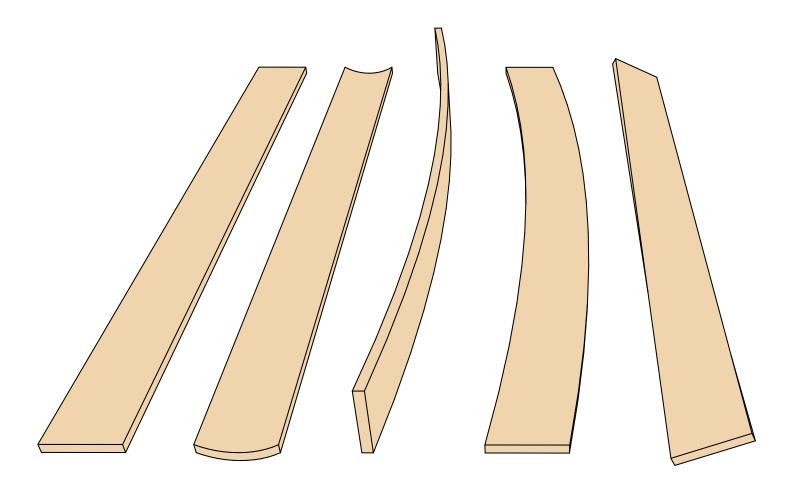
# Maple

Common Sizes	1x2, 1x3, 1x4, 1x6, 1x8
Softwood/Hardwood	# Hardwood
Color	Off-white to very light tan
Appearance	Smooth surfaces, square edges, subtle grain with light contrast
Common DIY Uses	Mid-century furniture, cabinets, dining tables
Workability	Moderately difficult to cut, holds fine-thread screws well but may require pilot holes to prevent splitting
Cost	\$\$\$\$\$

# How can I get the best boards?

Once you know what kind of wood you want and the size of boards you need, it's time to buy your lumber. But you don't want to just grab the boards that are easiest to reach. Take your time looking over the available boards and check them for these common defects. Ideally, you want every board to be flat and straight. You'll probably have to work around defects in some boards, though.

#### Common wood defects



#### **Flat**

Ideal

Faces are flat, edges are straight. Can easily be cut to any size.

#### Cup

Faces are not flat from side to side, edges are straight. May be able to rip narrow pieces that are fairly flat.

#### **Bow**

Faces are not flat from end to end, edges are straight. May be able to crosscut into shorter pieces that have fairly straight edges.

#### Crook

Faces are flat, edges are not straight from end to end. May be able to crosscut into shorter pieces that have fairly straight edges.

### **Twist**

#### Do not use

Faces are not flat, edges are not straight. These boards are beyond saving and shouldn't be used.