Smart, Stylish Cutting Boards

Consider the cargo when orienting the grain and shaping the board

BY TIM ALBERS

A cutting board is a good destination for short or narrow offcuts of attractive wood. Nicely designed cutting boards also add a touch of custom woodwork to your kitchen. And if you use templates to make your boards, as I do, you can churn out a stack of gifts.

While any slab of wood can be used as a cutting board, there is more to this topic than first meets the eye. You want a safe surface for food preparation, and one that will stand up to sharp blades and lots of moisture. There are also issues of form and function: The goal is a board that is both beautiful and suited to its specific purpose, whether for slicing meat, bread and cheese, or fruits and vegetables, or just for serving.

Avoid soft or oily species

The first step is selecting the wood. Cutting boards are pretty simple as woodworking projects go, so more emphasis is placed on the wood’s appearance as one of the primary design factors. Durability is another concern. Hard maple is the traditional choice for making a cutting board, but nearly any hardwood will stand up well in the home kitchen.

Most woods are safe for kitchen use, though there are a few to avoid. Stay away from the rosewoods, such as cocobolo, and don’t use olivewood, yew, or sassafras. Basically, avoid any wood that is known to cause allergic reactions or that has a high oil content, making gluing more difficult. It may seem obvious, but avoid softer woods like poplar, pine, and fir that will not hold up well to chopping and slicing. Deep cuts and cracks are potential homes for bacteria.

If you want to err as far as possible on the side of caution, stick with hard maple. It’s a little tougher to work with, but it creates a smooth, durable cutting board, and it’s available with a wide range of figure, such as quilted, curly, and bird’s eye.

An easy router project

Start with a template. This lets you fine-tune the shape before cutting into your good wood. Trace the shape onto the stock.

If you need one, rout the juice groove next. Use the first template to make an outside template, which will guide a top-bearing, roundnose router bit (top) or a router outfitted with a template guide.
Form starts with function

Cutting boards can be made in any shape, from basic rectangles and rounds to whimsical shapes or characters. There are no hard-and-fast rules. Traditionally, however, cutting boards are designed around their intended uses.

Boards designed for cutting meats can be round or rectangular, but should be designed to take a pounding. End-grain boards work well: Their durability and thickness are suited to the abuses of heavy chopping and cutting, while the extra mass keeps the board from sliding around the counter. End grain also has less of a dulling effect on knife blades than edge or face grain. Because of the extra weight, it's a good idea to incorporate some form of handle or fingerhold into a meat-cutting board. A thick, end-grain board might also be appropriate for cutting firm cheeses.

Boards used for cutting fruits and vegetables tend to be round or square. I've found a medium size of about 12 in. is convenient. Because there will be constant contact with liquids, edge-grain boards work well. Quartersawn lumber will allow for a thin but stable board with plenty of durability. Quartersawn stock often is narrow, which opens the door to using striped patterns of alternating woods.

A juice groove should be part of any board intended for cutting meats or fruits and vegetables. A juice groove is simply a recess cut or routed into the board's surface to collect liquids and prevent them from running onto the counter or floor.

For breads and cheeses I often make rectangular boards that

Saw and rout the perimeter. Saw close to the line before routing with a bearing-guided, flush-cutting bit.

Shape the edges. A bearing-guided bit makes a partial roundover on this board. Flip the board to complete the profile.
Many shapes and sizes
Cutting boards are best shaped to fit their cargo—long boards for bread, rounds and squares for cheese or meat, wide boards for fruits and vegetables. End grain and edge grain will stand up to a lot of abuse, while face grain is an attractive option for serving boards and bread boards, which don’t encounter as much moisture or heavy cutting.
resemble a loaf of bread or block of cheese, with a lighter profile and an elegant handle. Bread and cheese boards don’t take as much abuse as meat boards, and therefore don’t have to be quite as tied down by their purpose. Figured woods and highly sculptured profiles and handles are common. Without constant water contact, face grain will hold up just fine.

If you have room, it’s nice to have some boards dedicated to serving. These can be made from figured wood or can incorporate elegant design features that you wouldn’t necessarily use in a basic cutting board. These boards are great for serving breads, cheeses, or even appetizers. In creating some of these designs, I was particularly inspired by the cutting boards of Edward Wohl, a Wisconsin woodworker (www.edwardwohl.com).

Lighter boards can have hanging holes incorporated into their designs, either in the handle or in the body. Holes make storage easier and safer, and they can turn a stylish board into a wall decoration.

Glues: food-safe and waterproof
Through trial and error I have found the best results with high-grade polyvinyl acetate (PVA) glues, such as Titebond II and III, which contain a catalyst and are considered cross-linking glues. The catalyst creates a stronger bond than standard PVA glues. And Titebond II and III glues (when dry) are approved by the FDA for indirect food contact.

However, with any PVA, if you routinely submerge your cutting boards in water, you risk the glue joints failing eventually. Generally, a wooden cutting board should not be submerged in water or put in the dishwasher. It should be cleaned with warm water and soap, towel-dried, and left to air-dry further, preferably not lying on a flat surface.

Sand finely for a blotch-free oil finish
Since many of the boards are made with figured woods, I like to do most of my heavy sanding or scraping while the board still is a wide slab, before it is shaped. If you try to do a lot of sanding afterward, it will be harder to hold onto the workpiece and you’ll likely create a low spot somewhere or round over crisp edges.

After the board is sanded to P150-grit paper, cut and shape the profile. Then sand the board to P400-grit for a blotch-free oil finish. For a really smooth finish on end grain, go to P600 grit.

Two food-safe finishes
Like construction, finishing is straightforward. Flood the board with oil and let dry, wiping off the excess after 20 minutes. Mineral oil is the traditional choice. Look for mineral oil that meets the standard set by the United States Pharmacopeia (USP) organization, labeled “USP grade” or “meets USP standards.” Mineral oil comes in different viscosities, typically light, medium, and heavy. A lighter grade will provide slightly better penetration as an initial coat. A word of caution: Mineral oil can weep from the board for days, so let the board sit on paper or an old towel to catch the excess.

An alternative finish is walnut oil, which is applied in the same manner as mineral oil. The advantage of walnut oil is that it actually dries after a day or two, whereas mineral oil never completely dries. Both finishes are easily renewable.

Tim Albers is a part-time woodworker in Ventura, Calif., and loves to eat.