

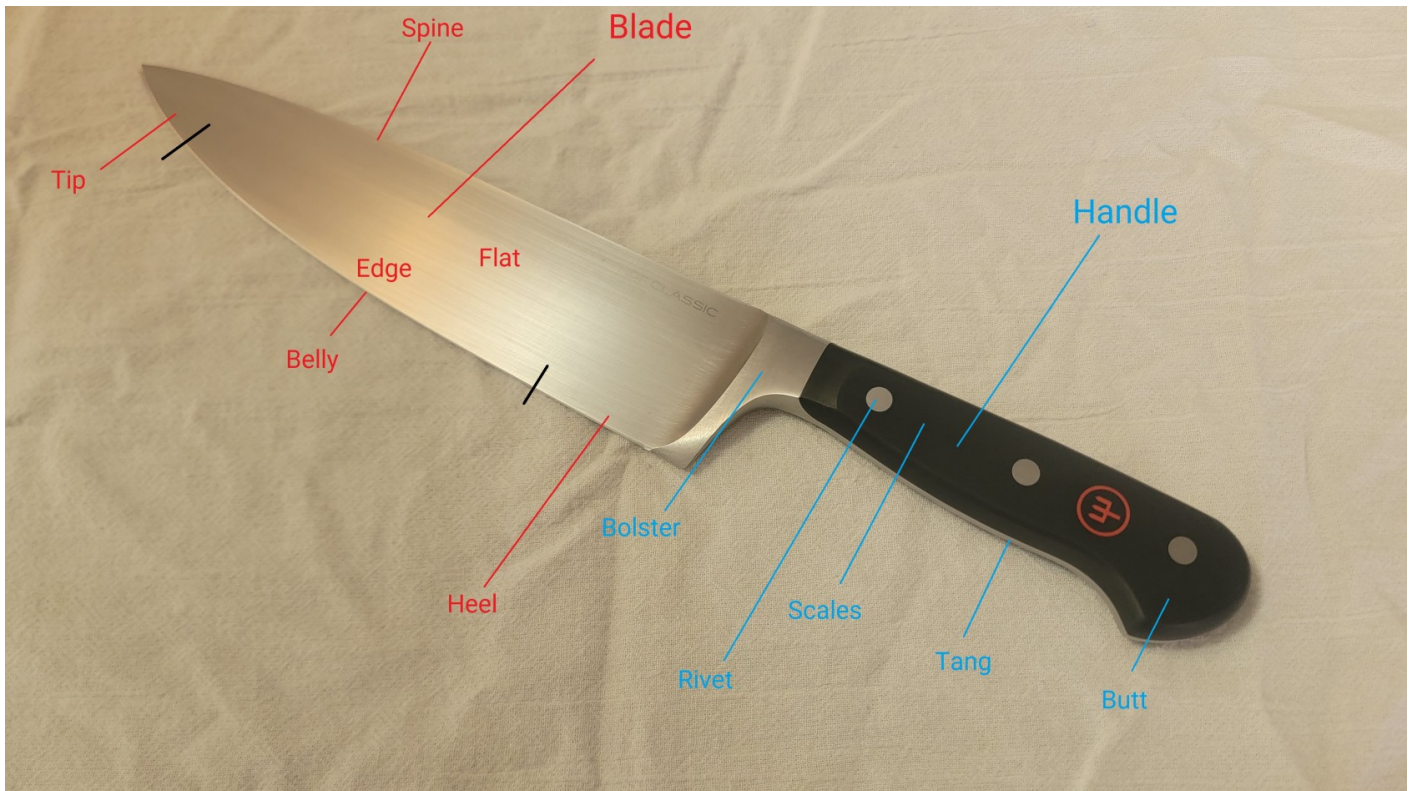
Equipment

This book focuses on using and caring for equipment in the kitchen, including knives, utensils, pots and pans, and appliances.

- Knives
 - Parts of a Knife
 - Sharpening and Honing
 - Caring for Knives
 - Types of Knives & Their Uses
- Utensils
- Pots and Pans
- Appliances

Knives

Parts of a Knife



Sections of a knife

Knives can be viewed as two pieces - a handle and a blade. You hold the handle; you cut with the blade.

The Handle

- **Handle:** The part of the knife that you hold. It is usually composed of a bolster, tang, scales, butt, and rivets, but not all knives have all of these components. For example, nearly no Japanese style chef's knives have bolsters.
- **Tang:** The core of the handle, almost always being the same piece of metal that the blade is made up of. Knives can have full tangs, which run the length of the handle, or half/partial tangs, which do not. It is generally considered better to have a full tang, as the handle is less likely to become loose, and the knives are often more balanced with a full tang.

- **Scales:** The handle's external part that you hold. These are often metal, hard plastic, or wood. The company that makes the knife will often place their logo on this piece.
 - **Rivet:** These hold the handle together, pressing the scales together around the tang.
 - **Butt:** The very back of the handle. The butt can be the same material as the scales, or fully metal, being a termination for the tang.
 - **Bolster:** The part of the knife that connects the handle to the blade. Bolsters are often very thick, usually running flush with the scales. Knives can have a full bolster, which runs the entire height of the back of the blade, half bolster, which starts at the top of the blade but does not reach the bottom, or even no bolster at all. If a bolster is present, there will usually be a smooth transition to the knife's blade from the bolster. You may see some people refer to the bottom part of the bolster as a finger guard.
-

The Blade

- **Edge:** The part of the blade that does the cutting. Includes the tip, belly, and heel. Can be completely flat or curved.
- **Tip:** The front of the edge, which includes the point if the knife has one; all knives have tips, but not tips end in a sharp point.
- **Belly:** The middle of the edge.
- **Heel:** The very back of the edge. The heel can have a dull section at the end of the edge, called a choil.
- **Spine:** The top part of the blade. Blades taper from the spine down to the edge.
- **Flat:** The middle of the blade, between the spine and edge.

Sharpening and Honing

Sharpening

Sharpening is done by removing material on a knife to create a sharp edge. I wouldn't recommend sharpening your own blades unless you have a desire to do it yourself and the correct equipment to do so. Improperly sharpening your knives will almost always result in a knife that doesn't cut well, as the angle of the grind during sharpening is crucial to get correct on both sides of the blade.

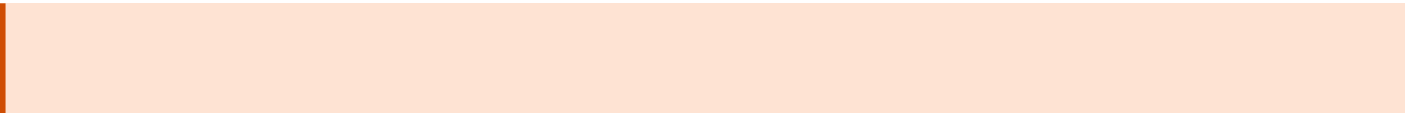
As sharpening removes material from the blade, you shouldn't sharpen your knife very often, as eventually you'll have less and less knife to work with, which will eventually lead to changing the way the knife can be used. While it would take a considerable number of sharpenings to do this, you can often find evidence of the dangers of oversharpening by looking at knives butchers use - due to the requirements they place on the knives, the best way to have the knife be sharp enough to work efficiently is to constantly sharpen the knife, which leads to very thin knives over time.

If you use your knife every day, you should aim to have it sharpened two to three times a year by a professional. Most knife sharpening services can visit you directly to pick up the knives or even sharpen them in a work van, or you can drop your knife off with them and come back later. Pricing varies, but having a single 8 inch chef's knife sharpened 3 times a year should be well under \$50.00.

If you sharpen your knives yourself, avoid using electric grinders as they can pull a lot of material off and result in uneven grinding angles. You should instead look at sharpening kits that allow you to mount your blade and sharpen it at specific angles using a variety of grits for the sharpening stones. I don't sharpen my own knives, so I can't give specific advice on how to do it.

Honing

Honing is done by straightening the edge of a knife. The edge of a knife is comprised of thousands upon thousands of microscopic serrations that are bent out of shape when the knife is used. A honing steel helps these micro-serrations stand back up, restoring your blade's cutting edge. You should hone your knife every two or three times you use it.



When honing a blade, make sure to alternate sides between strokes. Not alternating could lead to a badly formed edge, resulting in an uneven sharpness.

To hone a knife, you need a honing steel, which is a long piece of metal that has texturing on it to better manipulate your knife's edge. Here's how to use the honing steel:

1. Grab the steel by the handle, with the tip facing down.
2. Rest the steel on a cutting surface - you'll be running your knife to the tip of the steel, so you don't want to put the tip on anything you don't want scratched or cut.
3. Hold the knife to the steel at a 15-20 degree angle. Try as hard as you can to keep the angle consistent on both sides of the knife.
4. Starting from the heel of the knife, drag the cutting edge along the honing steel, moving towards the tip of the knife as you reach the tip of the steel. It helps me to imagine that I'm slicing a large, thin, roast.
5. Repeat steps 3 and 4 on the opposite side of the knife.
6. Do steps 3 through 5 until the knife feels sharp again, usually six to ten passes.

You can also hold the honing steel the opposite direction in front of you, repeating the same steps outlined above but floating in front of you. This is more difficult to do reliably, but it's an option.

Caring for Knives

Knife Handling

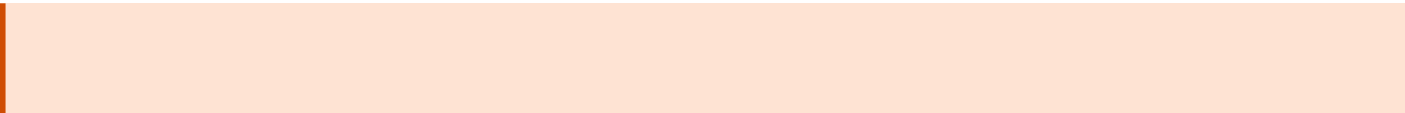
Using the knife you've chosen correctly is important for keeping the knife in good condition. I wouldn't recommend using a paring knife to bone a chicken, and I wouldn't recommend a cleaver to filet a fish. Using the knives improperly can lead to edge chipping, blade warping, tips being broken, etc., not to mention you'll probably have a hard time using the knives to say the least.

Here are some things to avoid doing with your knife. These are mostly common sense, but there's no harm in saying it anyways:

- Stabbing things: You'll break the tip of most knives right off if they get stuck in something like a bone or your cutting board.
 - Chopping/slicing too hard: At best you'll be dulling your blade, and at worst you can chip the edge of the blade. If you feel like you're not cutting easily enough, you should consider picking a different knife or sharpening the one you're using. If you're cutting meat or fruits that contain a pit, you could be hitting bone.
 - Cutting bone: Trying to cut bone with anything other than a very sturdy chef's knife or butcher's cleaver is a bad idea.
-

Cleaning

To clean a knife for storage, do the following right away:

1. Run the knife under warm water.
 2. Apply a small amount of dish soap to the knife.
 3. Use a sponge or rag to scrub any leftover food from the knife, paying extra attention to the edge of the blade.
 4. Rinse the knife until all of the soapy water is gone.
 5. Dry the knife as thoroughly as possible. I would even go as far as to get a paper towel to make sure the knife is completely dry with nicer knives.
 6. Store the knife.
- 

If you're switching between cutting raw meats and anything else, you should always wash the knife with hot, soapy water to prevent bacterial cross contamination.

If you're switching between foods you're cutting that *aren't* bacterial cross contamination threats, I recommend keeping a damp towel and a dry towel to wipe your blade down between foods. You'll avoid accidentally getting flavors where they shouldn't be - you probably don't want the apple you're about to cut flavored with the garlic that you just finished mincing.

Another note to keep in mind when cleaning your knives (chef's knives, utility knives, paring knives, steak knives) -- never put them in the dishwasher. Putting knives through a dishwasher can result in damaged edges from being knocked around by water jets, increased rust formation from long exposure to moisture, damaged handle scales from high heat and moisture, etc. If you've spent even a small amount of money on a decent knife, I cannot recommend washing it by hand enough. It would be better to let the knife stay on the counter, dirty, overnight than to put it in the dishwasher.

While you should clean your knife as soon as you're done with it, we're not machines and we sometimes can't immediately clean the knife, or we're just lazy. Either way, if you don't clean the knife right away, you at least shouldn't put it in the sink. The sink is an excellent way to break the tip off of a knife, especially longer knives like chef's knives, carving knives, etc.

Storage

Don't store knives loosely in drawers or on the counter. You could damage the knives, or worse, cut yourself, very easily this way.

Store knives in a dedicated place, like a magnetic knife rack, or in a knife block. I recommend the magnetic knife rack - knife blocks, especially ones made of wood, can trap moisture and allow bacteria to grow and can cause your knives to rust. If you do have a knife block, it's okay to use, just make sure the knives are completely dry before storing them.

Transport

If you intend to travel with your knives, you should roll the knives in a sturdy cloth (like a towel) or dedicated knife roll, which is usually made of something like leather. Avoid placing multiple knives too close together before rolling as they could damage each other in transit. Finally, if not using a dedicated knife roll with pouches and other ways to secure the knives, be very careful to roll the

knives relatively tightly - the knife could slip out and get damaged or hurt something or someone.

Types of Knives & Their Uses

Utensils

Pots and Pans

Appliances