

Handling Sportcaught Fish

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Whether you catch them in freshwater or saltwater, fish spoil quickly if you don't handle them properly from the moment you land them. Mishandle fresh fish, and you end up with softened flesh, a strong flavor, and a "fishy" or sour odor. Handle fresh fish properly, and you will enjoy a delicate flavor, fine texture, and a pleasing or neutral odor.

To ensure good eating quality, you need to plan ahead for how you will clean, chill, and transport the fish.

Equipment Needs

- Ice chest or cooler
- Ice—crushed is best ("blue ice-type products" are adequate for short time periods)
- Sharp knife for slitting gills, cleaning, and filleting
- Fish scaler, if scales need removing
- Plastic food storage bags for packing fish in the cooler

Essential Steps After Catching Fish

1. Kill the fish quickly or keep them alive in a mesh basket under water. Kill, bleed, and gut a fish as quickly as possible after landing. A single, heavy blow to the head stuns or kills the fish, making the fish easier to

handle. It also prevents the bruised flesh that occurs when fish flop around after being landed. Slitting the throat or cutting the gills also kills the fish quickly.

Freshwater fish like crappie or bass are best if cleaned and iced immediately after you kill them. If you want to keep your fish alive, use a stinger or mesh basket that holds them under water in the lake or river where you are fishing. Avoid placing the fish in a bucket of water. Fish quickly use up the limited oxygen in a bucket of water and die.

2. Bleed the fish immediately after killing.

"Bleeding" the fish means you cut the fish, preferably at the throat or through the gills and sometimes through the artery at the tail. Work quickly since the fish's heart continues to pump for a few minutes, even though the cuts kill the fish. The heart's pumping action forces blood out of the fish through the cuts and prevents accumulated blood from

discoloring the flesh and causing undesirable changes in flavor and texture.

Here's a good method for bleeding a large fish.

1. Stun the fish, string a rope or line through its mouth and gills, and dangle the fish over the side of the boat. (Don't submerge the fish in water yet.)
2. Cut the throat or gills and let the fish bleed into the water.
3. Submerge the fish under the water.
4. Bring the fish into the boat before you move to a new location.
5. Clean and gut the fish promptly and thoroughly. "Gutting" the fish involves cleaning out its body cavity and removing blood, bacteria, and other material in the digestive tract. You should also cut out the gills. Removing the fish's internal organs and gills slows down spoilage and may also prevent parasites from moving into the fish's flesh. If you can't gut the fish immediately, at least bleed it and chill it until you gut it later.

If you bleed or gut the fish inside a boat, use a plastic garbage bag to catch the fish's

internal organs and blood. Discard the waste appropriately (for instance back at the dock or boat launch site). Discarding fish organs into the water may be illegal.

4. Chill the fish with plenty of ice. Cooling fish is critical. Spoilage begins as soon as the fish dies. All fish, gutted or not, spoil rapidly if they aren't chilled right away. Ice is the best choice for chilling fish. Cold sea or lake water is the next best choice, followed by covering the fish with a wet cloth. Note the temperature of the water in which you're fishing. During the summer, surface temperatures of normally cold ocean waters can reach 65 °F or higher. Keeping fish in water that warm isn't a good idea. If you plan to be out all day in a boat, bring ice.

Never let fish lie in the sun. Keep them shaded and wet if ice is unavailable. Cover fish with a wet, porous cloth like burlap or an old sheet. Cooling occurs as water evaporates from the cloth.

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Do not put fish in a plastic bag unless you have ice. A plastic bag traps heat and accelerates fish spoilage.

Cold temperatures slow spoilage. Fish adapted to cold waters deteriorate rapidly at refrigerator temperatures (above 42 °F). Chilling and storing fish in crushed ice (about 32 °F) enable the fish to keep at peak quality longer. "Blue ice" types of products are less effective at lowering storage temperatures to 32 °F.

Use lots of ice to chill fish quickly. One pound of ice for each 2 pounds of fish is a good rule of thumb. Use more if you have a long trip home. Use crushed rather than cubed ice. This prevents sharp ice cube edges from cutting delicate fish and allowing spoilage bacteria to build up in the cuts. However, any ice is better than no ice.

Place fish in small plastic bags with less than 5 pounds of fish per bag. Then place the bags in a cooler and surround them with ice. Surround large, dressed fish with ice in a single bag, and put ice in the belly cavity. Drain the meltwater as necessary. Blood and bacteria drain from the fish into the melted ice, so avoid letting the fish lie in the meltwater.

Consider the following table, which shows the relationship between storage time and quality of freshly fish fillets:

Holding Temperature	High Quality Shelf Life
42 °F	3 ½ days
32 °F	8 ½ days

Note that fish kept in crushed ice at 32 °F will last much longer than fish kept at 42 °F, which is the most common refrigerator temperature. *Ice is the key to fresh tasting fish.*

Note

Fishing regulations prohibit mutilating fish in the field so that its size or species cannot be determined by officials. Even though your fish may be in a cooler in your car trunk, the fish may still be considered "in the field" by your state fish and game enforcement agency. Consider leaving the tail, fins and head on the fish until you get home.

5. Cook or preserve the fish as soon as possible.

Wash the fish (fillets or whole) in cool, fresh water and repack them in fresh ice as soon as you return home. Properly cleaned and iced fish keeps 4 to 5 days with little loss of eating quality and nutritional value.

You're now ready to cook or preserve your fish. Handle the fish as you would any raw product. Wash your hands before and after touching the fish. Be sure to clean all surfaces that come in contact with fish juices.

Cook the fish thoroughly according to your favorite recipe. Thorough cooking destroys harmful bacteria and parasites. A rule of thumb is to cook fish 10 minutes for every inch of thickness. Small, thin fillets will cook in just a few minutes. Fish is done when the flesh has just begun to turn from translucent to opaque or white and is firm but still moist. Overcooked fish is tough and dry.

Don't eat raw fish unless it has been frozen solid to destroy parasites. Large fish may take 48 hours at 0 °F to freeze solidly. Improper smoking methods may result in undercooked, unsafe fish. Lightly marinated or salted raw fish recipes may be unsafe unless the fish has been frozen. *Do not eat any fish unless it has been heated sufficiently or solidly frozen at some point in preparation.*

Once the fish is cooked, keep it hot or chill it. Refrigerate leftovers within 2 hours of serving. Cooked fish keeps another day in the refrigerator before its quality deteriorates. Avoid freezing leftover cooked fish as quality is poor.

Freezing is a safe method for preserving fresh fish. Bacteria that can cause illness do not grow at freezer temperatures. Use appropriate packaging materials to protect fish from moisture loss and oxygen damage. Fatty fish like salmon lose their quality faster in frozen storage than lean fish. For best quality, plan to freeze fish no longer than 3 to 6 months.

Safety note

Fish caught in open water are unlikely to be contaminated with pollutants such as chemical residues. If you fish in waters near urban or industrial areas that could be polluted, consult your state natural resource agency for guidelines on recommended fishing locations.

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