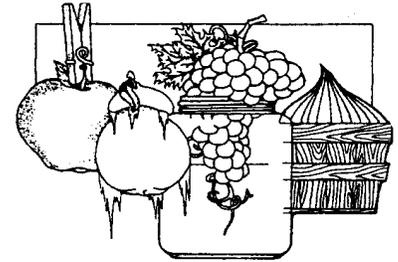


# Quality for Keeps



Information for those who produce and preserve food

## Preserving pleasing peppers

*As Americans enjoy more cultural foods, the popularity of peppers has grown from the green bell pepper to many fiery hot varieties.*

Fresh peppers can be stored in a refrigerator for about a week. Peppers will keep best if they are kept dry and washed just before eating. To wash peppers, gently rub them under cold running water. Always store cut produce in the refrigerator to prevent growth of microorganisms that can cause illness.

Capsaicin is the substance that makes peppers hot and the heat produced by peppers is measured in Scoville Units. The chart on page two shows some of the most common peppers and how hot they can be.

Some people believe that the capsaicin makes the peppers more acidic, but all peppers have a pH of 4.8 to 6.0 depending on maturity and type. This means peppers are low acid and must have an ample amount of acid added to be home-canned in a boiling water bath. Pickled peppers can be processed in a boiling water bath, thus preserving more of their crispness. Even when peppers are pressure canned, a small amount of vinegar or lemon juice is added. Firm,

fresh, disease free and damage free peppers should be used for canning or pickling. Salt is optional; use canning or pickling salt to prevent cloudiness. A clear, 5% vinegar should be used. White vinegar will prevent discoloring of peppers. Varieties can be mixed when canning, but the ratio of total volume of peppers to vinegar needs to be maintained. Process peppers in half-pint or pint jars only.

**Freezing.** Peppers lose their crispness when frozen and thawed. Frozen peppers are useful in cooked dishes where texture is not important, but the pepper's flavor is desirable. Unlike most vegetables, they do not require blanching before freezing. Peppers can be sliced or diced, quick frozen on a cookie sheet, and packed into moisture- and vapor-proof containers.

**Roasted peppers.** Roasted red bell peppers, popular in many recipes, can be prepared in advance and frozen. Anaheim peppers can also be prepared in advance and frozen for use in chiles rellenos.

- To peel, first heat in a gas flame, on the barbecue, or under the broiler until the skins separate from the flesh. Then cover peppers in a bowl for 5

to 10 minutes. Skins will slip off easily.

- Remove stem and seeds.
- Flatten whole peppers to remove air, or cut peppers into strips or other convenient pieces.
- Pack prepared peppers into moisture- and vapor-proof packaging, excluding as much air as possible. A sheet of waxed paper or plastic wrap between peppers will make them easier to handle when thawing.
- Label and freeze at or below 0°F. Frozen peppers will maintain their quality for 9 months.



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**Drying.** In Missouri, sun drying peppers is not an option due to the humidity. High humidity will cause peppers to spoil before they can dry. In an air conditioned house where the humidity is low, peppers can be air dried.

To air dry, cut a slit in the side of the peppers, then use a large needle and heavy thread to string the peppers. Hang peppers in a place where air circulates freely for three to four weeks. A food dehydrator or oven can also be used to dry peppers. Large peppers dry better if they are cut into smaller pieces and seeds and membranes are removed.

**Storage.** Store dried peppers in a moisture- and vapor-proof container, then place container in a cool, dark, dry place.

To use peppers in a recipe, rehydrate by soaking dehydrated pieces in water. Dried peppers can also be crumbled or blended into a powder to use for seasoning. Dried peppers will keep for several months.

*Source: Adapted from the "Complete Guide to Home Canning", Agriculture Information Bulletin No. 539, USDA, revised 2009.*

## Scoville Chart

Pepper	Scoville Units
Habanero	100,000 to 300,000
Thai	50,000 to 100,000
Cayenne	30,000 to 50,000
Serrano	5,000 to 15,000
Jalapeno	2,500 to 5,000
Poblano	1,000 to 1,500
Cherry	100 to 500
Bell	0
<i>Source: Http://anrcatalog.ucdavis.edu</i>	

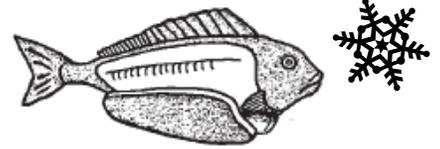
## 2012 Market Guide

For the freshest produce, buy at local farmers' markets or community markets. Farmers' markets provide an effective marketing system for the producer or farmer. The producers are often part-time, retired, or hobby gardeners looking to supplement their incomes.

Farmers' markets are much more than just a place to sell food. They are a venue for socializing, where urban residents meet farmers. Consumers benefit by receiving fresh, high quality products and the opportunity to directly interact with the producers.

We are happy to have the new [2012 Market Directory](http://Extension.missouri.edu/ecregion/market.index.html) online and ready to use: <http://Extension.missouri.edu/ecregion/market.index.html>. This directory lists east central region growers and vendors that sell all types of products and produce. It lists Farmers' Markets (F), Greenhouses (G), Organic growers (O), Pick-your-own (P), Roadside stands (R), Subscription (S), Wholesale farms (W), and Meat (M).

## Freezing fish, the one that didn't get away



*After a good day on the water, the easiest way to preserve fish is to freeze it. Properly frozen fish keeps for a long time if it is stored at a consistent temperature of 0°F and is properly packaged.*

For best quality, use lean fish (cod, flounder, trout, haddock, halibut, Pollack, perch, whiting, redfish, croaker, snapper, grouper, sheepshead and most freshwater fish) in 4 to 6 months; fatty fish (mullet, salmon, swordfish, mackerel, bluefish, tuna and smelt) will be best if used within 2 to 3 months. Since food quality does not improve with freezing, always start with fresh fish that has been properly pan dressed.

Freezing prevents the growth of micro-organisms that cause both food spoilage and food-borne illness. Home freezing is not likely to destroy *Trichina* and other parasites like commercial freezing, although thorough cooking will destroy all parasites.

**Pan dressing.** Fish for freezing should be as fresh as possible and kept in crushed ice, until it can be frozen. Wash fish in clean water and remove scales by scraping fish gently from tail to head with the dull edge of the knife.

Remove entrails after cutting entire length of belly from vent to head. Cut the head off just above collarbone. Break backbone over edge of cutting board or table. Trimming the back fins with shears or a knife will not get the bones at the base of the fin. To remove the entire fin, cut the flesh along each side and pull the fin out. Wash fish thoroughly in cold running water.

**Filleting and slicing.** Fish is now ready to be cut for freezing. Cut large fish into steaks or fillets for easier cooking.

For steaks, cut fish crosswise into ¾-inch thick steaks. To fillet, cut down the back of the fish from tail to head.

Then cut down to the backbone just above the collarbone. Place the knife flat on the backbone with the sharp edge of the blade away from you and cut flesh using the backbone as a guide until you get to the tail. Lift off entire side of fish in one piece, freeing fillet at tail. Turn the fish over and repeat to cut the fillet from other side.

**Pretreat.** Pretreat fish to improve quality of the stored fish. For a high quality frozen fish, a lemon-gelatin ice-glaze is suggested. To prepare glaze: mix ¼ cup lemon juice and 1¾ cups water. Dissolve one packet of unflavored gelatin in ½ cup lemon juice-water mixture. Heat the remaining 1½ cups of liquid to boiling. Stir dissolved gelatin mixture into the boiling liquid. Cool to room temperature. When cool, dip cold fish into the lemon-gelatin glaze and drain. Place freezer paper between fish for easier separation. Wrap fish in moisture- and vapor-resistant packaging, label and freeze.

If a lemon-gelatin glaze is not being used, dip fatty fish for 20 seconds in an ascorbic acid solution, made from 2 tablespoons ascorbic acid to 1 quart of cold water, to control rancidity and flavor change. Lean fish may be dipped for 20 seconds in a brine of ¼ cup salt to 1 quart of cold water to firm fish and decrease drip loss on thawing. After this treatment, fish can be ice-glazed, or packed in water for freezing.

**Ice-glaze pack.** For an ice-glaze, place unwrapped fish in freezer to freeze. When fish is frozen, dip fish in ice cold water. Return fish to the freezer for a few minutes to harden the glaze. Repeat glaze steps until there is a uniform cover of ice on the fish. Place freezer paper between fish for easier separation. Wrap fish in moisture- and vapor-resistant paper, or place in freezer bags. Label packages and freeze.

**Water pack.** Fish can be frozen by placing in a shallow metal, foil, or plastic pan, covered with water and frozen. Wrap or cover with a moisture-proof covering, and label. However, the quality may not be as good as glazed methods.

Package fish in heavy-duty aluminum foil, plastic wrap, freezer paper, or plastic freezer bags. These materials will keep air out and prevent moisture loss. If air reaches frozen fish, it may get freezer burn. This makes food look undesirable by appearing as grayish-brown leathery spots. Food is still safe to eat; just trim freezer-burned portions before, or after cooking the food.

Freezing fish fast improves quality. Foods that are frozen slowly result in large ice crystals, causing dripping and excess loss of moisture when thawed. Foods will freeze faster, if cold air can circulate around it. Therefore, avoid placing large amounts of food into the freezer at the same time.

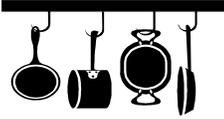
Source: [http://www.clemson.edu/extension/hgic/food/food\\_safety/preservation/hgic3064.html](http://www.clemson.edu/extension/hgic/food/food_safety/preservation/hgic3064.html)

### 2012 Fish Advisory

Before consuming fish from local streams and lakes, check the Missouri Department of Conservation Fish Advisory listings: <http://www.health.mo.gov/living/environment/fishadvisory/pdf/12fishadvisory.pdf>.

Some streams and some species of fish can potentially have unacceptable levels of mercury and lead. Bottom feeding fish are most affected.

## THE RECIPE BOX



### Pickled Bell Peppers

- 7 pounds firm bell peppers
- 3-1/2 cups sugar
- 3 cups vinegar (5%)
- 3 cups water
- 9 cloves garlic
- 4-1/2 tsp. canning or pickling salt

**Procedure:** Wash peppers, cut into quarters, remove cores and seeds, and cut away any blemishes. Slice peppers into strips. Boil sugar, vinegar and water for 1 minute. Add peppers and bring to a boil. Place 1/2 clove garlic and 1/4 teaspoon salt in each sterile half-pint jar; double the amounts for pint jars. Add pepper strips and cover with hot vinegar mixture, leaving 1/2-inch headspace. Adjust lids and process accordingly in a boiling-water canner: For hot packs, half-pints or pints, process for 5 min. at altitudes of 0-1,000 ft.; 10 min. at 1,001-6,000 ft. altitude.

**Yield:** About 9 pints.

*Source: Adapted from the "Complete Guide to Home Canning", Agriculture Information Bulletin No. 539, USDA, revised 2009.*

*Quality for Keeps*, published monthly, April through October, is made available to residents of East Central and Southeast Missouri by their Extension Councils. Contact your county Extension office to subscribe, or visit our website <http://missouri.extension.edu/franklin>. Questions may be directed to:

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