

In a pickle

Will Langlands & Nicole Narbonne

Food Skills Weekend May 1, 2009

## **Canning Basics**

Think of canning as a precision form of cooking. You will use ordinary kitchen skills but must observe instructions exactly to ensure that the food is sterilized and safe. This is one time when you definitely shouldn't improvise.

### How to can:

#### Select jars and lids

Use mason-type jars, which come in a variety of sizes. Pints and quarts are common and suitable for most canning. Choose from easy-to-fill widemouthed jars or traditional-looking narrow-mouthed jars. You can either start with new jars (they cost less than 75 cents each) or recycle previously used but still perfect (no cracks or chips) canning jars. Avoid mayo jars and other kinds of glass containers because they may not hold up to processing.

The lids used for canning consist of two pieces—a flat metal disk (rimmed with a rubber gasket) that covers the jar opening, and a screw-on band that holds the disk in place. Always use new flat metal disks because the gasket around each rim can begin to deteriorate after sitting in storage for 5 or more years; consequently, it may fail to seal. You can reuse screw-on bands, though, as long as they look good and have no rust.

#### Sterilize

Wash lids and jars in hot, soapy water—either by hand or in the dishwasher. Then sterilize the lids by submerging them in hot water and boiling them for 10 minutes. Remove the pan from the heat but leave the tops in hot water until you're ready to use them. Do the same for jars that will be processed for less than 10 minutes. Use jar lifters to handle the hot jars.

### Slice and dice

Start with top-quality fruits and vegetables, and avoid any that are overripe or blemished. For maximum vitamin retention, process produce immediately after it's harvested. Wash well and cut into pieces as specified in each given recipe. To prevent browning of fruits such as peaches and pears, keep them in an ascorbic- acid solution where you buy canning supplies after you slice them. To keep produce from discoloring once it is canned, during preparation **do not use any bowls, cookware, or utensils made of aluminum, copper, iron, or chipped enamel**. And if your water is hard, use soft bottled water to prepare the food and to fill jars of produce.

### Fill and cap

Using a large spoon or ladle, put the produce (raw or cooked, depending on the crop) loosely into jars. Then fill the jars with either boiling water, pickling solution (for pickles), or sweet syrup or white grape juice (for fruit). Because produce will expand during the canning process, don't fill the jars all the way; instead, leave some headspace—or space between the contents and the top of the jar. (The problem with food being forced out of the jar because of insufficient headspace is more than just the mess it makes in the canner. Food that winds up outside on the jar's rim or around the lid can harbor mold, which can break a seal and cause the canned food to spoil.) Most vegetables and fruits—either in pint or quart jars—need about a half-inch of headspace, but don't assume that is always true. Headspace requirements change with the density, shape and cooking characteristics of individual foods. Always follow headspace requirements in a recipe. And be sure to measure the space carefully—too much headspace can make it more difficult to seal jars.

With a soft plastic spatula, push down on the produce in each jar to submerge it under the liquid; then run the spatula along the inside of the jar to eliminate air bubbles. Next, use a damp paper towel to clean off the jar rims. Close each jar with a sterilized two-piece lid, checking the manufacturer's instructions to be sure it is not too tight or too loose.

#### Load the canner

Put filled, capped jars into a canning jar rack and then lower the rack into the canner by its handles, or use a jar lifter to insert individual jars into a rack that's already in place in the pot. Position the jars in the canner so that they are not touching.

### Cook away

Canning uses heat to destroy molds, yeasts, bacteria, and other organisms that cause spoilage. How much heat is needed, and consequently what kind of canner to use (a boiling-water canner or a pressure canner), depends on whether produce is acidic or not. In general, boiling-water canners are used for acidic produce and are much faster; pressure canners are used for nonacidic produce and require longer processing times.

If you're using a boiling-water canner, fill the pot about halfway full with water—enough to reach an inch or two above the jars after they've been loaded into the canner. Preheat the water to about 180 degrees F for hot-packed produce or 140 degrees F for raw-packed produce to prevent the jars from cracking. Insert the canning rack and capped jars. Cover the canner and bring water to a steady, gentle boil, which must be maintained throughout the required processing time. (Do not start timing until the water starts to boil.) Because water boils at lower temperatures at higher altitudes, processing times may be longer (and higher pressures are likely to be needed for pressure canning). If you live at a higher elevation, check with your local Cooperative Extension Service agent for canning recipes adapted to your region.

If you're using a pressure canner, follow the manufacturer's directions, which will vary depending on the type of canner and the altitude. Generally, put 2 inches of hot water in the pressure canner, add the jars, put the lid on the pot, and increase the pressure before you start tracking processing time. When processing is finished, let the pressure drop before opening the canner and removing the jars.

### Cool and check

Use jar lifters to gently remove the jars from the canner and place them an inch apart on a wooden board to cool. While they cool, the lid gaskets become firmly sealed to the jars.

After 24 hours, check the lids to be sure they are airtight. Push down on each metal lid: It should not give or spring back up. If any jar is not sealed, put it in the refrigerator and enjoy its contents for dinner. Once a jar is safely sealed, write the name of the contents and the date of canning on its metal lid with a permanent marker. Wipe off any food on the outside of the jar.

#### Store the bounty

To preserve vitamin content and discourage lid corrosion, find a cool, dark, dry out-of-the-way place to keep your canned goods.

from www.organicgardening.com

# Rhubarb Chutney

Prepare 7 or 8 pint jars & lids 8 cups rhubarb cut into 1/2" slices 1 chopped red onion (or a couple yellow) 2 chopped, peeled apples 1 1/2 cup chopped dried cherries (or raisins) 6 garlic cloves, chopped 2 Tablespoons finely chopped fresh ginger 1/2 cup chopped celery 3 cups brown sugar 1 1/2 cups red wine vinegar 2 teaspoon salt 1/2 teaspoon pepper 1 Tablespoon cinnamon 1 1/2 teaspoon cloves 1 1/2 teaspoon allspice 1 1/2 teaspoon coriander

Combine all the ingredients in a good sized pot. Bring to boil. Reduce heat & simmer uncovered 30 minutes or until thick, stirring frequently.

Fill 500 ml sterilized jars within 1/2 inch of top. Clean off any spills, and put caps and lids on firmly, but not excessively tight.

Place jars in boiling water bath. Allow water to return to boil. Boil 10 minutes. Remove from canner & allow to cool. Do not tighten lids.

Nicole's Party Salsa

Prepare about 11 pint jars & lids.

10 cup grated zucchini

4 chopped onions

2 green peppers, chopped

2 red peppers chopped

1/4 cup course salt

4 jalapeno peppers (or hotter!)

Mix these together and let sit all day or overnight. Drain.

5 Tablespoon dry mustard

4 cloves garlic, minced (at least)

1 Tablespoon cumin

1 Tablespoon turmeric

2 Tablespoon cayenne pepper

2 cup vinegar

1 cup brown sugar

5 – 6 cup chopped tomatoes

2 small cans tomato sauce

2 tins tomato paste

(can also add a couple canned chipotle peppers chopped fine. This adds a wonderful smoky flavour to the salsa)

Mix all together, then add to above mixture. Bring to boil & simmer 30 – 40 minutes. When nice and thick, pour into jars & can 30 minutes. (you can add cilantro but it tastes like s\*\*t.)

# **Dilled** Carrots

Prepare 7 or 8 pint jars & lids 6 cups cold water 2 cups pickling vinegar 1/2 cup pickling salt 1/4 teaspoon cream of tartar 6 lb tender carrots 6-7 cloves garlic 6-7 dill sprigs Combine water, vinegar, salt and cream of tartar in large pot. Heat to boiling. Meanwhile, put 1 garlic clove and 1 dill sprig in each of 7 clean pot pint jars. Fill with carrots laid out length-wise so that they look nice in the jar. Pour hot vinegar mixture over. Seal jars & process 10 minutes. Ready in 3 weeks.

## Pickled Beets and Onions

Prepare about 4 pint jars & lids.

- 8 10 cups 2" diameter beets (about 15)
- 4 onions, peeled and cut in large chunks

1 cup sugar

1 3/4 cups cider vinegar

4 cups water

2 teaspoons whole allspice

1 cinnamon stick, broken

1 teaspoon pickling salt

Wash beets, leaving tap roots and 2 - 3 inches of stem. Cook in boiling water until just tender, about 20 - 30 minutes.

Plunge into cold water; remove skins, stems and roots. Cut larger beets in half or quarters. Chop onions and mix with beets.

Combine remaining ingredients in large pot; simmer for 15 minutes.

Pack beets & onions into clean, hot jars, leaving 1/2 inch of head space. Cut larger beets if necessary.

Return liquid to boil and pour over beets, leaving 1/2 inch head space. Seal and process in boiling water bath for 30 minutes.

# Dad's Dills

Prepare enough jars & lids for the number of cucumbers you have harvested.

cup vinegar
cup water
Tablespoons sugar
Tablespoons pickling salt
Dill weed, scalded
garlic cloves
young fresh pickling cucumbers

This recipe is meant to be very simple so you can just jar up a few cukes every time they are ready in the garden. You make the brine of the vinegar, water, salt and sugar, and if you don't use it all that day, keep it in the fridge to add to the next batch. Don't be afraid to double it if you have lots of cucumbers!

Start with hot, sterilized jars. Scrub the cucumbers, peel the garlic and scald the dill with boiling water.

Heat the brine to boiling.

Place a garlic clove & some dill in each jar. Fill tightly with cucumbers. Pour the boiling brine over. Seal and process.

Don't eat these for at least a couple months.

Blackberry Jam

Prepare 7 or 8 half-pint jars & lids

Pick sufficient blackberries to have 3 3/4 cups crushed berries ... about 6 or more cups.

1/4 cup lemon juice

6 1/2 cups sugar

1 pouch liquid pectin

Crush berries, one layer at a time. Sieve half of the pulp to remove some seeds if desired. In large pot, stir together prepared fruit, sugar & lemon juice. Bring to boil over high heat. Boil hard for one minute. Remove from heat and stir in pectin.

Stir and skim 5 minutes.

Pour into prepared jars up to 1/4 inch head space. Cover with lids & screw rings tightly.

Peach Skin Jelly

8 pints

\* 4 quarts peelings and seeds from peaches, minimum

To every 3 cups juice

\* 1 package dry pectin

\* 3 cups sugar

Place a minimum of 4 qts peelings and seed in heavy pan. Barely cover with water. Bring to boil and let simmer for about 30 minutes.

Let stand overnight.

Strain juice through cheesecloth. Measure 3 cups juice into pan.

Add 1 pkg powdered pectin.

Bring to a rigorous boil and add 3 cups sugar. Boil juice rapidly until drops sheet off spoon as in jelly testing.

Remove from heat. Stir five minutes & skim off foam.

Pour into sterilized jars to within 1/2 inch from top. Band and process in water bath for 5 minutes.

# **Pickled Fish**

Day 1: 5 lbs fish 1 cup picking salt 1 gallon water Day 3: white vinegar Day 4: 4 cups white vinegar 3 cups sugar 1 cup white wine 1/4 cup pickling spice 1 - 2 white onions, peeled & sliced Day 8: ready to eat!

First, you have to catch the fish :)

Cut 5 lbs of fish into chunks. (I used white fish) Place in container that will fit in fridge. Cover with brine using 1 cup pickling salt in 1 gallon water. Place in fridge for 48 hours. Drain. Rinse. Cover with white vinegar.

Return to fridge for 24 hours.

Drain.

Bring to boil 4 cups fresh white vinegar and 3 cups sugar. Cool.

Wash your container. Layer the fish back into the container alternating with layers of thinly sliced white onions and 1/4 cup pickling spice. (One or more large onions will be required.)

Pour 1 cup white wine over and then cover with cooled vinegar and sugar mixture. These pickled fish are ready to eat in 3 days, but can be kept in the fridge for months. (they never last very long at my house!)

# **Canning Peaches**

To can peaches choose ripe, mature fruit of ideal quality for eating fresh or cooking. Peaches can be packed in very light, light or medium sugar syrup. They can also be packed in water, apple juice or white grape juice. Prepare the liquid syrup and keep it hot.

Remove skins from peaches by using a small paring knife or if preferred, dip fruit in boiling water for 30 to 60 seconds until skins loosen.canning peaches Dip quickly in cold water and slip off skins. Cut in half, remove pits and slice to quarters for better fit. When canning Cling peaches before removing skin it is necessary to cut around the peach and down to the pit with a paring knife. Make this cut slightly off center easier separation. Then while holding peach in the palms of your hands twist fruit in opposite directions to separate halfs. Then use a peach pit knife to remove pit. Be very carefull when cutting out the pit. Push the knife gently downward and under the pit and then around it

Drop cut fruit into mixture of 1 gallon water and 2 tablespoons each salt and vinegar. This will help to keep peaches from darkening. When all the fruit has been cut, rinse with water and drain before packing. Keep all the unblemished skins and all the pits that have not split open and use them in the Peach Skin Jelly recipe!

Cold Pack into sterilized jars and cover with boiling sugar syrup leaving 1/2 inch head space. Run a rubber spatula or table knife gently between peaches and jar to release trapped air bubbles. Add more syrup if needed. Wipe rim and screw threads with a clean damp cloth. Add lid, screw band and tighten firmly and evenly. Do not over tighten.

Place jars on rack of hot water bath canner, slowly and gently, lower rack bring water back to boil and process using the hot water bath method.

\* pts. 25 min. \* qts. 30 min.

Yields \* 48 pounds--18 to 24 quarts

After processing, remove jars immediately, place on a rack to cool.

## **Canning Basics for Preserving Food**

Canning is an important, safe method for preserving food if practiced properly. The canning process involves placing foods in jars or similar containers and heating them to a temperature that destroys micro-organisms that cause food to spoil. During this heating process air is driven out of the jar and as it cools a vacuum seal is formed. This vacuum seal prevents air from getting back into the product bringing with it contaminating micro-organisms.

### Safe Canning Methods

There are two safe ways of processing food, the boiling water bath method and the pressure canner method:

\* The boiling water bath method is safe for tomatoes, fruits, jams, jellies, pickles and other preserves. In this method, jars of food are heated completely covered with boiling water (212°F at sea level) and cooked for a specified amount of time

\* Pressure canning is the only safe method of preserving vegetables, meats, poultry and seafood. Jars of food are placed in 2 to 3 inches of water in a special pressure cooker which is heated to a temperature of at least 240° F. This temperature can only be reached using the pressure method. A microorganism called Clostridium botulinum is the main reason why pressure processing is necessary. Though the bacterial cells are killed at boiling temperatures, they can form spores that can withstand these temperatures. The spores grow well in low acid foods, in the absence of air, such as in canned low acidic foods like meats and vegetables. When the spores begin to grow, they produce the deadly botulinum toxins(poisons).

The only way to destroy these spores is by pressure cooking the food at a temperature of 240°F, or above, for a specified amount of time depending on the type of food and altitude. Foods that are low acid have a pH of more than 4.6 and because of the danger of botulism, they must be prepared in a pressure canner.

- \* The low acidic foods include: meats
- \* seafood
- \* poultry
- \* dairy products
- \* all vegetables

High acid foods have a pH of 4.6 or less and contain enough acid so that the Clostridium botulinum spores can not grow and produce their deadly toxin. High acidic foods can be safely canned using the boiling water bath method.

- \* The high acidic foods include: fruits
- \* properly pickled vegetables

Certain foods like, tomatoes and figs, that have a pH value close to 4.6 need to have acid added to them in order to use the water bath method. This is accomplished by adding lemon juice of citric acid.

from www.canning-food-recipes.com

You don't have to cook fancy or complicated masterpieces just good food from fresh ingredients. Julia Child (1912 - 2004)