CANNING EQUIPMENT

Jars
Standard Mason-type jars made especially for home canning are recommended. They are available in ½ pint, pint, 1½ pint, quart, and ½ gallon sizes, and come with regular and wide mouth tops. (Half gallon jars may only be used to can very acid juices.) Also available for canning are the 8 and 12 ounce decorator jelly jars.

With careful use and handling, Mason jars may be used for many years, requiring only new lids with each use.

Most commercial pint and quart mayonnaise or salad dressing jars may be used in a boiling water canner. These jars should not be used in a pressure canner. The chances of a non-standard commercial jar breaking or not sealing are greater than for standard Mason jars. Before using a commercial jar, be sure to check carefully for the following:

- Even thickness of glass: sides, bottom, and top.
- No evidence of stress, bubbles, or uneven places in the glass.
- Continuous threads to hold the screw band firmly.
- Proper depth of jar neck so band will screw all the way down.
- Standard shape and size (pint or quart).

Antique jars with wire bails and glass caps or zinc porcelain-lined caps are no longer recommended for home canning because they often fail to seal properly.

Make sure that jars used for home canning are in good condition. Discard any with cracks or chips.

Before every use, wash empty jars in hot soapy water and rinse well. Scale or hard-water films are easily removed by soaking jars several hours in a 1 cup of vinegar per gallon of water.

Lids and Screwbands
The common self-sealing lid consists of a flat metal disc held in place by a metal screw band during processing. The flat lid is crimped around the edge to form a trough, which is filled with a colored gasket compound. When jars are processed, the lid gasket softens and flows slightly to cover the jar-sealing surface, yet allows air to escape from the jar. The gasket then forms an airtight seal as the jar cools.

Buy only the quantity of lids that you will use in a year. To ensure a good seal, carefully follow the manufacturer’s directions in preparing lids for use. As manufacturers change sealing compounds, the instructions for lid preparation and use changes. It is important to follow the instructions outlined on the package.
Examine all metal lids carefully. Do not use old, dented, or deformed lids, or lids with gaps or other defects in the sealing compound.

**Do not retighten lids after processing.** As jars cool, the contents contract, pulling the self-sealing lid firmly against the jar to form a vacuum.

- If rings are too loose, liquid may escape from jars during processing, and seal may fail.
- If rings are too tight, air cannot vent during processing, and food will discolor during storage. Over tightening also may cause lids to buckle and jars to break, especially with raw-packed, pressure-processed food.

Screwbands are not needed on stored jars. They should be removed after the jars have cooled. After removing, wash and dry the bands and store in a dry area. If care is taken, the bands may be reused many times. If left on stored jars, they become difficult to remove, often rust and may not be reusable.

**Pressure Canner**

All low acid foods (meat, poultry, fish, vegetables) must be processed in a pressure canner. Only pressure canners can reach temperatures high enough (240°F) to kill harmful bacteria which can grow in these canned foods.

Pressure canners come in many sizes. Most canners hold 7 quarts or 9 pints. The smaller canners only hold 4 quarts. Larger canners can hold two layers of pints. Pressure saucepans are no longer recommended for canning because they heat up and cool down too fast so can result in underprocessing.

Pressure canners should have an accurate dial gauge or a weighted gauge to indicate the pressure. Most canners have a gasket to keep the steam from leaking out around the cover. A petcock, safety valve, or weight is used to control the escape of air or steam. The canner should have a rack to hold the jars off the bottom.

**Boiling Water Canners**

High acid foods (fruit, tomatoes, pickles, jams/jellies) should be processed in a boiling water canner.

Boiling water canners are made of aluminum, stainless steel, or porcelain-covered steel. They have removable perforated racks and fitted lids. The canner must be deep enough so that at least 1 inch of briskly boiling water will be over the tops of jars during processing. A flat bottom is best on an electric range. Either a flat or ridged bottom can be used on gas burner. To ensure uniform processing of all jars with an electric range, the canner should be no more than 4 inches wider in diameter than the element on which it is heated.

Source: OSU Master Food Preserver Program