

1974

## EC74-959 Pickles & Relishes

Ethel Diedrichsen

Follow this and additional works at: <http://digitalcommons.unl.edu/extensionhist>

---

Diedrichsen, Ethel, "EC74-959 Pickles & Relishes" (1974). *Historical Materials from University of Nebraska-Lincoln Extension*. 4250.  
<http://digitalcommons.unl.edu/extensionhist/4250>

This Article is brought to you for free and open access by the Extension at DigitalCommons@University of Nebraska - Lincoln. It has been accepted for inclusion in Historical Materials from University of Nebraska-Lincoln Extension by an authorized administrator of DigitalCommons@University of Nebraska - Lincoln.

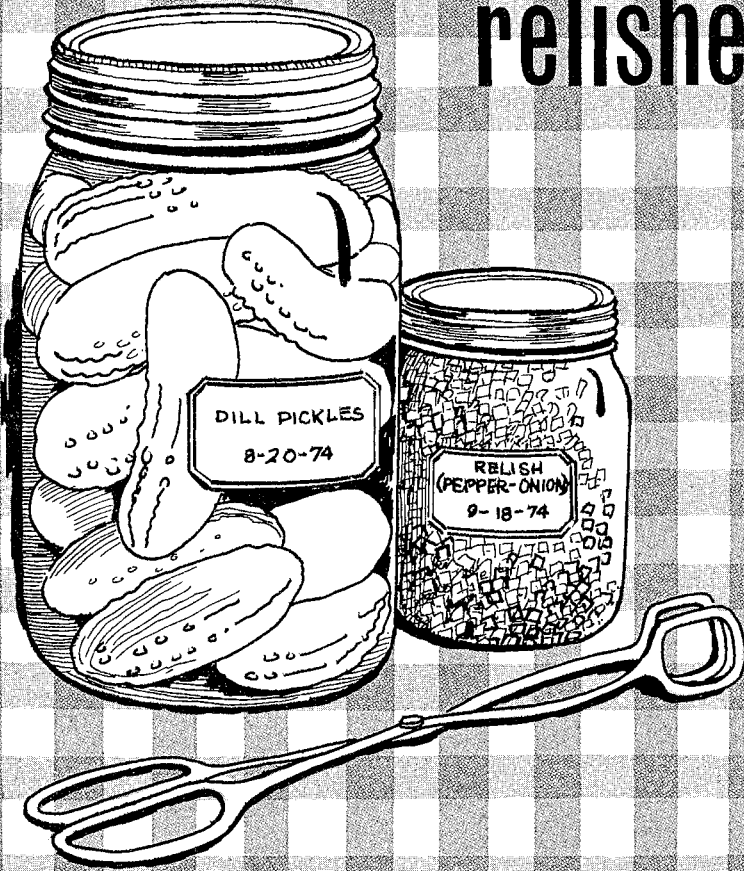
AGRI  
S  
85  
E7

OCT 15 1974

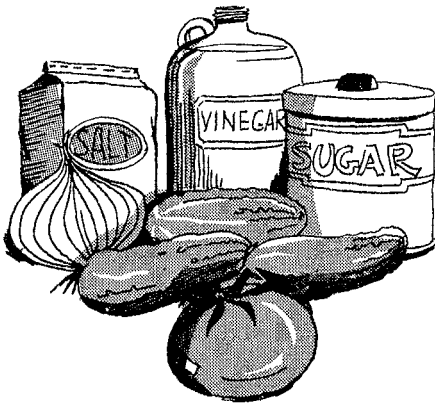
EC 74-959

# 74-959

# PICKLES & relishes



Extension work in "Agriculture, Home Economics and subjects relating thereto," The Cooperative Extension Service, Institute of Agriculture and Natural Resources, University of Nebraska-Lincoln, Cooperating with the Counties and the U. S. Department of Agriculture  
J. L. Adams, Director



# PICKLES & relishes

Ethel Diedrichsen  
Extension Specialist, Food and Nutrition

Pickling is a process of preserving food with salt and vinegar, with or without spices or sugar. The skillful blending of ingredients with fruits and vegetables gives a crisp, firm texture and pungent, sweet-sour flavor.

Although food markets today offer a variety of pickles and relishes, many homemakers like to make their own pickle products when garden vegetables and fresh fruits are in abundant supply.

## Classes and Characteristics

Pickle products are classified on the basis of ingredients used and method of preparation. There are four general classes.

### Brined Pickles

These fermented pickles go through a curing process of about three weeks. Dilled cucumbers, sauerkraut and green tomatoes belong to this group. A desirable flavor that is not excessively sour, salty or spicy is developed during the curing period.

### Fresh Pack or Quick-process Pickles

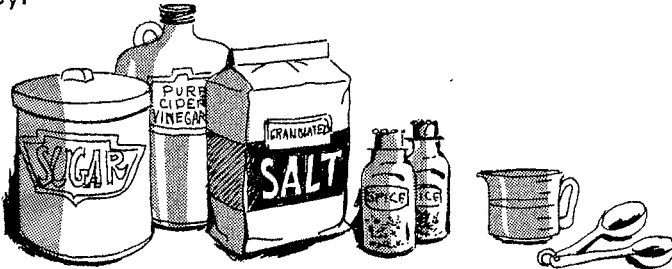
These can be crosscut cucumber slices, whole cucumber dills, sweet gherkins or dilled green beans. These are brined for several hours or overnight, then drained and combined with boiling-hot vinegar, spices and other seasonings and processed for a short time. They are quick and easy to prepare and have a tart, pungent flavor.

## Fruit Pickles

These are usually prepared from whole fruits and simmered in a spicy, sweet-sour sirup. Pears, peaches and watermelon rind are prepared in this way. They should be bright in color, of uniform size, tender and firm without being watery.

## Relishes

Relishes are prepared from fruits and vegetables which are chopped, seasoned and then cooked to desired consistency. Clear, bright color and uniform size of pieces make an attractive product. Relishes accent the flavor of other foods. They may be quite hot and spicy.



**Ingredients for Successful Pickling**

Satisfactory pickle products can be obtained only when quality ingredients are used and proper procedures are followed. Correct proportions of fruit or vegetable, sugar, salt, vinegar and spices are essential. Alum and lime are not needed to make pickles crisp and firm if up-to-date procedures are used.

## Fruits and Vegetables

Select tender vegetables and firm fruit. Pears and peaches may be slightly under-ripe for pickling. Unwaxed cucumbers are better for pickling whole because the brine cannot penetrate a heavy waxed coating.

## Salt

Use pure granulated salt if available. Free flowing table salt has an added ingredient to keep it from caking which may make the brine cloudy. Iodized table salt may darken pickles.

## **Vinegar**

Use a high-grade vinegar of 4 to 6 percent acidity. Cider vinegar has a good flavor and aroma but may discolor white or light-colored fruits and vegetables. White, distilled vinegar has a sharp, pungent acetic acid taste and is used with pickled pears, onions and cauliflower to help keep the natural color.

Do not dilute the vinegar unless the recipe so specifies. If a less sour product is preferred, add sugar rather than decrease the vinegar.

## **Sugar**

Use either white granulated or brown sugar. White sugar gives a lighter color but brown sugar may be preferred.

## **Spices**

Use fresh whole spices for best flavor in pickles. Powdered spices tend to darken pickles and relishes. Tie whole spices in a clean white cloth and remove them before pickles are packed.

# **Equipment for Successful Pickling**

## **Utensils**

The right kind and size of equipment will save time and energy. To heat pickling liquids, use utensils of unchipped enamelware, stainless steel or non-stick coated material. Do not use copper, brass, galvanized or iron utensils. These metals react with acids or salts and cause undesirable color changes in the pickles or form undesirable compounds.

For fermenting or brining, use a crock, plastic container, stone jar, unchipped enamel-lined pan, large glass jar or bowl. Use a plate with a weight or a plastic bag filled with water to hold the vegetables below the surface of the brine.

Small utensils that add ease and convenience to home pickling include measuring cups and spoons, sharp knives, tongs, vegetable peelers, ladle with lip for pouring, slotted spoon, trays, footed colander or wire basket, wide-mouth funnel, food chopper or grinder and wooden cutting board.

## **Scales**

Household scales will be needed if the recipes specify ingredients by weight. They are necessary in making sauerkraut to insure correct proportions of salt and shredded cabbage.

## **Jars and Lids**

Select jars and lids that are free of cracks, chips, dents or any defect that may prevent airtight seals and cause needless spoilage. Wash jars in hot soapy water and rinse thoroughly before filling. Metal lids may need boiling or holding in boiling water for a few minutes before they are used. This softens the sealing compound for a better seal.

Do not use jars and lids from commercially canned foods. They are designed for use on special packing machines and are not suitable for home canning.

## **Water-bath Canner**

Any large metal container with a rack and close fitting lid may be used for a water-bath canner. It should be deep enough to allow 1 or 2 inches of water above the tops of the jars, plus extra space for boiling.

A steam-pressure canner may serve as a water bath. To use it for this purpose, set the cover in place without fastening it. Be sure the petcock is wide open so that steam escapes and pressure is not built up.

## **Procedures for Successful Pickling**

To insure good quality pickles and to prevent spoilage, follow recommended procedures. Ingredients, time and money may be wasted if you use outdated or careless canning procedures.

Use fruits and vegetables as soon as possible after gathering. If they cannot be used immediately, refrigerate them or spread them where they will be well ventilated and cool. This is particularly important for cucumbers because they deteriorate rapidly especially at room temperature.

Wash fruits and vegetables thoroughly in cold running water or through several changes of water. Lift them out of the water each

time. Handle gently to avoid bruising.

Be sure to remove all blossoms from cucumbers. They may be a source of the enzymes responsible for softening the cucumbers during fermentation.

Fill jars firmly and uniformly with the pickle product. Be sure to leave head space at the top of the jar as recommended in the recipe. Wipe the rim and threads of the jar with a clean, hot cloth to remove any particles of food, seeds or spices. Even a small particle may prevent an airtight seal.

The two-piece metal lid and screw band is the most commonly used closure. To use this, place the lid on the jar and screw the metal band down tight by hand to hold the sealing compound against the glass. This will allow enough "give" to let air escape during processing. **Do not tighten screw band further after processing.**

Pickle products require heat treatment to destroy organisms that cause spoilage and to inactivate enzymes that may affect flavor, color and texture. Adequate heating is best achieved by processing the filled jars in a boiling water-bath. Open-kettle canning is not recommended because spoilage organisms may enter the food when it is transferred from kettle to jar.

Processing time for fermented pickles, fresh pack dills and sauerkraut is counted differently from the usual boiling water-bath procedures. For these products, start to count time as soon as the filled jars are placed in the actively boiling water. This prevents development of a cooked flavor and a loss of crispness.

To process pickles using your favorite recipe, follow this time table.

Thin slices	5 minutes
Chunk style	10 minutes
Whole cucumbers, 1 to 3 inches	5 minutes
Whole cucumbers, 3 to 4 inches	10 minutes
Large pickles	15 minutes

When the processing time is up, remove the jars and cool them top side up, on a wire rack, several inches apart to allow for free circulation of air. Keep jars out of a draft. Do not cover.

Remove the metal screw bands from the jars as soon as they are cool. Wash them and store in a dry place for reuse. The metal lids may be used only once.

Wipe the jars with a clean, damp cloth and label with name of

product and date. Store the pickles in a dark, dry cool place.

Always check for signs of spoilage. A bulging lid or leakage may mean that the contents are spoiled.

When a jar is opened, look for other signs of spoilage, such as spurting liquid, mold, disagreeable odor, change in color, or an unusual softness, mushiness or slipperiness of the pickle product. If there is any indication of spoilage, do not eat or even taste the contents. Dispose of them, wash the jar and boil in clean water for 15 minutes.

## Recipes

### Brined Dill Pickles

20 lb cucumbers, 3 to 6 inches long  
¼ cup whole mixed pickling spice  
2 to 3 bunches fresh or dried dill  
2½ cups vinegar  
1 ¾ cups salt  
2½ gallons water

Wash cucumbers and remove the blossom end. Place half the pickling spices and a layer of dill in a 5-gallon crock or jar. Fill the crock with cucumbers to within 3 or 4 inches of the top. Place a layer of dill and remaining spices over the top of cucumbers. Mix the vinegar, salt and water and pour over the cucumbers.

Cover closely to keep the cucumbers under the brine. Hold at room temperature and remove scum daily. Scum may start forming in 3 to 5 days. If necessary, make additional brine, using original proportions specified in recipe. In about three weeks the cucumbers will have become an olive-green color and should have a desirable flavor. Any white spots inside the fermented cucumbers will disappear in processing.

The original brine is usually cloudy as a result of yeast development during the fermentation period. If this cloudiness is objectionable, fresh brine may be used to cover the pickles when packing them into jars. In making fresh brine, use ½ cup salt and 4 cups vinegar to 4 quarts of water. The fermentation brine is generally preferred for its added flavor and should be strained before heating.

Pack the pickles, along with some of the dill, into clean hot quart



jars; add garlic, if desired. Avoid too tight a pack. Cover with boiling brine to ½ inch of the top of the jar and seal. Process in boiling water for 15 minutes. Makes 9 to 10 quarts.

### **Fresh-pack Dill Pickles**

17-18 lb cucumbers, 3 to 5 inches in length  
2 gallons 5 percent brine (¾ cup salt to 1 gallon water)  
6 cups vinegar  
¾ cup salt  
¼ cup sugar  
9 cups water  
2 tablespoons pickling spice  
2 teaspoons whole mustard seed per quart jar  
3 heads fresh or dried dill

Wash cucumbers and remove blossom end. Cover with brine and let set overnight. Drain. Combine vinegar, salt, sugar, water and mixed pickling spices tied in a bag. Heat to boiling. Pack cucumbers into quart jars. Add mustard seed, dill and garlic to each jar. Cover with boiling liquid to within ½ inch of top of jar. Seal and process in boiling water for 20 minutes. Larger cucumbers may be sliced crosswise. Thin slices are processed for 5 minutes. Makes 7 quarts.

### **Crosscut Pickle Slices**

4 quarts medium size, sliced cucumbers  
1½ cups sliced onions  
2 large garlic cloves  
1/3 cup salt  
2 trays ice cubes  
4½ cups sugar  
1½ teaspoon turmeric  
1½ teaspoon celery seed  
2 tablespoons mustard seed  
3 cups vinegar

Wash cucumbers and slice into 1/8 or 1/4 inch slices; discard ends. Add onions and garlic. Mix in salt thoroughly and cover with crushed ice or ice cubes. Let stand for 3 hours. Drain and remove garlic cloves. Combine sugar, spices and vinegar; heat just to boiling.

Add cucumbers and onion slices and heat 5 minutes. Pack hot pickles loosely into pint jars to ½ inch of top. Seal and process in boiling water for 5 minutes. Makes 7 pints.

### Sweet Gherkins

- 7 lb cucumbers, 1½ to 3 inches long
- ½ cup salt
- 8 cups sugar
- 6 cups vinegar
- ¾ teaspoon turmeric
- 2 teaspoons celery seed
- 2 teaspoons whole mixed pickling spice
- 8 one-inch pieces stick cinnamon

*First day.* Morning: Wash and drain cucumbers. Place in large container and cover with boiling water. Afternoon: (6 to 8 hours later) Drain; cover with fresh, boiling water.

*Second day.* Morning: Drain; cover with fresh, boiling water. Afternoon: Drain; add salt; cover with fresh, boiling water.

*Third day.* Morning: Drain; prick cucumbers in several places with table fork. Make a sirup of 3 cups of the sugar and 3 cups of the vinegar; add turmeric and spices. Heat to boiling and pour over cucumbers. (Cucumbers will be partially covered at this point.) Afternoon: Drain sirup. Add 2 cups of the sugar and 2 cups of the vinegar. Heat to boiling and pour over pickles.

*Fourth day.* Morning: Drain sirup; add 2 cups of the sugar and 1 cup of vinegar. Heat to boiling and pour over pickles. Afternoon: Drain sirup; add remaining 1 cup sugar and heat to boiling. Pack pickles into jars and cover with boiling sirup to ½ inch of top of jar. Seal and process for 5 minutes. Makes 7 to 8 pints.

### Pickled Beets

- 3 quarts peeled, cooked small beets
- 2 cups sugar
- 2 cups water
- 2 cups vinegar
- 1 teaspoon ground cloves
- 1 teaspoon ground allspice
- 1 tablespoon ground cinnamon

Pack beets into jars. Combine other ingredients and simmer 15 minutes. Pour hot sirup over beets to within  $\frac{1}{2}$  inch of top of jar. Process 30 minutes. Makes 6 pints.

### Tomato-Apple Chutney

- 3 quarts peeled and chopped tomatoes
- 3 quarts peeled and chopped apples
- 2 cups white seedless raisins
- 2 cups chopped onions
- 1 cup chopped green peppers
- 2 lb brown sugar
- 1 quart vinegar
- 4 teaspoons salt
- 1 teaspoon ground ginger
- $\frac{1}{4}$  cup whole mixed pickling spice

Combine all ingredients except the whole spices. Tie spices in a bag and add to tomato apple mixture. Bring to a boil; cook slowly, stirring frequently, until mixture is thickened (about 1 hour). Remove spice bag. Pack the boiling-hot chutney into pint jars to  $\frac{1}{2}$  inch of the top of jar. Seal and process for 5 minutes. Makes 7 pints.

### Pickled Peaches

- 3 quarts sugar
- 2 quarts vinegar
- 7 two-inch pieces stick cinnamon
- 2 tablespoons whole cloves (optional)
- 16 lb peaches, small or medium size

Combine sugar, vinegar, stick cinnamon and cloves. Bring to a boil and let simmer covered, about 30 minutes. Wash peaches and remove skins. Prepare 2 or 3 quarts at a time. Add to boiling sirup, heat for about 5 minutes and pack into jars. Add 1 piece of stick cinnamon and 2 or 3 whole cloves to each jar. When all peaches have been packed, cover with the boiling sirup to  $\frac{1}{2}$  inch of top of jar. Seal and process for 20 minutes. Makes 7 quarts.

## Watermelon Pickles

3 quarts watermelon rind (about ½ large melon)  
¾ cup salt  
3 quarts water  
2 trays ice cubes  
9 cups sugar  
3 cups white vinegar  
3 cups water  
1 tablespoon whole cloves  
6 one-inch pieces stick cinnamon  
1 lemon, thinly sliced

Pare rind and all pink edges from the watermelon. Cut into 1-inch squares or fancy shapes as desired. Cover with brine made with salt and water. Add ice cubes and let stand 5 or 6 hours. Drain. Cover with cold water and cook until fork tender, about 10 minutes. Drain.

Heat sugar, vinegar, water and bag of spices. Boil 5 minutes and pour over the watermelon. Add lemon slices and let stand overnight. Heat watermelon in sirup to boiling and cook until watermelon is translucent (about 10 minutes). Pack pickles loosely into pint jars. To each jar, add 1 piece of stick cinnamon from spice bag. Cover with boiling sirup to ½ inch of top of jar. Seal and process for 5 minutes. Makes 4 or 5 pints.

The sugar may be reduced to 8 cups for a less sweet pickle. Red or green coloring may be added to the sirup if desired.

## Piccalilli

1 quart chopped green tomatoes  
1 cup chopped sweet red peppers  
1 cup chopped green peppers  
1½ cups chopped onions  
5 cups chopped cabbage  
1/3 cup salt  
3 cups vinegar  
2 cups brown sugar  
2 tablespoons whole mixed pickling spice

Combine vegetables, mix with salt; let stand overnight. Drain and press in a clean, thin white cloth to remove all liquid possible. Combine vinegar, sugar and add spices tied in a bag. Bring to a boil; add vegetables and simmer about 5 minutes. Remove spice bag. Pack into pint jars to within  $\frac{1}{2}$  inch of top and seal. Process for 5 minutes. Makes 4 pints.

### Corn Relish

- 2 quarts whole kernel corn (about 16 to 20 ears)
- 1 pint diced sweet red peppers
- 1 pint diced green peppers
- 1 quart chopped celery
- 1 cup chopped onions
- 1½ cups sugar
- 1 quart vinegar
- 2 tablespoons salt
- 2 teaspoons celery seed
- 2 tablespoons dry mustard
- 1 teaspoon turmeric

Cook ears of corn in boiling water for 5 minutes. Cut from cob and measure. Combine peppers, celery, onions, sugar, vinegar, salt and celery seed. Bring to a boil for 5 minutes, stirring occasionally. Blend dry mustard and turmeric with a little liquid and add with corn to boiling mixture. Boil for 5 minutes, stirring occasionally.

This relish may be thickened by adding  $\frac{1}{4}$  cup flour blended with  $\frac{1}{2}$  cup water at the time the corn is added for cooking. Frequent stirring will be necessary to prevent sticking and scorching. Pack loosely; seal and process for 15 minutes. Makes 6 pints.

### Sauerkraut

- 20 to 25 lb cabbage
- $\frac{1}{2}$  lb salt ( $\frac{3}{4}$  cup)

Remove the outer leaves from firm mature heads of cabbage; wash and drain. Cut into halves or quarters and remove the core. Use a shredder or sharp knife to cut the cabbage into thin shreds about the thickness of a dime.

In a large container, thoroughly mix 3 tablespoons salt with 5 pounds shredded cabbage. Let the salted cabbage stand for several

minutes to wilt slightly. This allows packing without excessive breaking or bruising of the shreds. Pack the salted cabbage firmly and evenly into a large clean crock or jar. Press down firmly until the juice comes to the surface. Repeat the shredding, salting and packing of cabbage until the crock is filled to within 3 or 4 inches of the top.

Place a plastic bag filled with water on top of the cabbage. The water filled bag seals the surface from exposure to air, and prevents the growth of film yeast or molds. It also serves as a weight. For extra protection, the bag with the water in it can be placed inside another plastic bag. Any bag used should be of heavyweight, watertight plastic and intended for use with foods.

Formation of gas bubbles indicates that fermentation is taking place. Room temperature is best for fermenting cabbage. Fermentation is usually completed in 5 or 6 weeks.

*To store:* Heat sauerkraut to simmering but do not boil. Pack hot sauerkraut into jars and cover with hot juice to ½ inch of the top. Seal and process in boiling water bath, 15 minutes for pints and 20 minutes for quarts. Makes 8 or 9 quarts.

Good sauerkraut has a pleasant tart and tangy flavor and is free from any off-flavors or off-odors. It is crisp and firm in texture and has a bright, creamy-white color.

### **Tomato Catsup**

- 4 quarts peeled and chopped tomatoes
- 1 cup chopped onions
- ½ cup chopped sweet red peppers
- 1½ teaspoons celery seed
- 1 teaspoon mustard seed
- 1 teaspoon whole allspice
- 1 stick cinnamon
- 1 cup sugar
- 1 tablespoon salt
- 1½ cups vinegar
- 1 tablespoon paprika

Cook tomatoes, onions and pepper until soft and press through a sieve. Cook about 1 hour until volume is reduced about one-half. Add spices in a bag, sugar and salt to tomato mixture. Cook about 25 minutes, stirring frequently. Add vinegar and paprika and cook until

thick, stirring to prevent sticking. Pour hot into jars leaving 1/8 inch head space. Seal and process 10 minutes. Makes 3 pints.

### **Horseradish Relish**

- 1 cup grated horseradish
- ½ cup white vinegar
- ¼ teaspoon salt

Wash and peel horseradish roots and grate or chop in blender. Combine ingredients and pack into jars. Seal tightly. Store in refrigerator.

### **Pepper-Onion Relish**

- 1 quart chopped onions (6 to 8 large)
- 1 pint chopped sweet red peppers (4 or 5)
- 1 pint chopped green peppers (4 or 5)
- 1 cup sugar
- 1 quart vinegar
- 4 teaspoons salt

Combine all ingredients and cook until slightly thickened (about 45 minutes), stirring occasionally. Pack into jars and seal. Store in refrigerator. For longer storage, process for 5 minutes. Makes 5 half-pints.