Fresh Lemons vs. Bottled Lemon Juice for Canning

Whether adding lemon juice to tomatoes to acidify them safely or adding lemon juice to a jelly or jam, the best and safest choice is bottled lemon juice. Here’s why.

Bottled lemon juice is standardized, or uniformly acidified, per FDA regulations. Therefore, it is consistent which provides a known level of safety for food preservation. The final acidity of a food product is critical to deter the growth of microorganisms that can cause spoilage or foodborne illness.

Use bottled lemon juice in all canning for safest results.
Photo: Canva.com

As a reminder, when canning tomatoes, they must be acidified by using bottled lemon juice, citric acid, or vinegar with 5% acidity. Here are the choices and recommended usage levels:

- **Bottled Lemon Juice**
  1 tablespoon per pint
  2 tablespoons per quart

- **Citric acid**
  1/4 teaspoon per pint
  1/2 teaspoon per quart

- **Vinegar with 5% acidity**
  2 tablespoons per pint
  4 tablespoons per quart

Sources: Iowa State University AnswerLine and K-State Research and Extension

New Website for Kansas Local Foods

Building communities through local foods. That is the goal in growing local food businesses across Kansas.

A new website for Kansas Local Foods has been launched to help. There are many resources, ways to get involved, find local foods, and grow your community.

Rebecca McMahon and Amanda Lindahl are the leaders of this program. You can learn more about them and find their contact information at www.k-state.edu/kansaslocalfoods/learn-more/staff.html.

Sign up for the mailing list to get connected.
Choosing Vinegar for Pickling and Canning

First step, read the label. Look for vinegar that is 5% acidity.

Today’s recipes, including Extension and USDA food preservation recipes, use vinegar that has 5% acidity. Not all vinegars are the same. They range from 2.5% to more than 6%. Therefore it is important to read the label or ingredient statement to verify the acidity level.

The National Center for Home Food Preservation at the University of Georgia gives these recommendations if you have used a vinegar with less than 5% acidity.

- If your canned food has been preserved for less than 24 hours using 4% vinegar, it is advisable to store the jars in the refrigerator to maintain the safety and quality of the product.

- If your canned food has been preserved for more than 24 hours using 4% vinegar, it is advisable to discard the product.

Choose Canning Lids for Defects

Canning lids are essential for canning food. When preparing lids to use, take a look at them to be sure they are in good condition to reduce problems after canning.

Always use new lids, never reuse canning lids as the rubber seal is already indented and the lid was likely bent when removing it from the jar.

Wash new lids in hot, soapy water. That’s it! Do not boil them as that step is no longer required. Boiling the lids can lead to seal failures.

Look at the underside of the lid. Defects can happen, such as the irregular sealing compound on the lid in the picture. This can lead to seal failures. Contact the manufacturer to report the problem.

Kansas 4-H/FFA Wheat Expo Reminder

There’s still time! Register now for the Kansas 4-H/FFA Wheat Expo. This annual event will be on August 8th in Pratt, KS.

What can you enter? A jar of cleaned wheat, yeast rolls, cookies, muffins, photography, education posters and Cloverbuds can also participate. Exhibits must all use wheat.

There are educational activities and two tours of local agriculture operations. All ages are encouraged to attend!

Learn more and register at www.kansas4-h.org/events-activities/conferences-events/wheat/index.html.

Check Canning Lids for Defects

Wheat Expo Reminder
Jam and Jelly Problems and Solutions

Sometimes jam and jelly recipes just don’t turn out right. So here are some problems, causes, and prevention strategies.

<table>
<thead>
<tr>
<th>PROBLEM</th>
<th>CAUSE</th>
<th>PREVENTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Too soft</td>
<td>Overcooking fruit to extract juice</td>
<td>Avoid overcooking as this lowers jellying capacity of pectin</td>
</tr>
<tr>
<td></td>
<td>Used too much water to extract juice</td>
<td>Use recommended amount</td>
</tr>
<tr>
<td></td>
<td>Incorrect amounts of sugar and juice</td>
<td>Measure correctly</td>
</tr>
<tr>
<td></td>
<td>Undercooking jam or jelly mixture</td>
<td>Follow cooking times exactly</td>
</tr>
<tr>
<td></td>
<td>Insufficient acid</td>
<td>Lemon juice may need to be added</td>
</tr>
<tr>
<td></td>
<td>Making too large of a batch</td>
<td>Make only one recipe at a time</td>
</tr>
<tr>
<td></td>
<td>Moving finished jars too soon</td>
<td>Allow finished jars to sit at least 12 hours</td>
</tr>
<tr>
<td></td>
<td>Insufficient time before using</td>
<td>Some fruits take up to 2 weeks to set completely</td>
</tr>
</tbody>
</table>

A Caution About Preserving White Peaches

It’s almost peach season and many will be preserving this summer favorite in various tasty treats.

White fleshed peaches, however, cannot be canned like yellow peaches. White peaches are low acid so traditional canning cannot be done, and that includes water bath canning and pressure canning. No research has been done for safe canning. This includes plain peaches, jam, jelly, or any other mixture.

The best option is to freeze white peaches or eat them fresh.

Source: University of Georgia

Climate Change and Vibrio Infection

Found in marine waters, Vibrio bacteria like warm waters of summer. Humans can become ill through foodborne routes such as raw or undercooked seafood or from contaminated water. The symptoms include vomiting, diarrhea, swimmer’s ear, or skin infections. There are rare instances of sepsis, amputations and death.

Climate change is causing sea surface temperatures to rise which increases the prevalence of Vibrio bacteria. It is likely to intensify in the future. This will lead to increases costs of medical treatments, productivity losses, and premature death.

As summer vacations continue, a visit to the ocean may be on the agenda. Avoid consuming raw or undercooked shellfish. Wash your hands after handling shellfish. If you have open wounds, stay out of sea water or brackish water.

Sources: USDA Economic Research Service, Amber Waves, June 26, 2023
CDC Vibrio Species Causing Vibriosis
Melons are another summer treat! They are best eaten fresh, but freezing them for later use is an option.

Rinse with water and scrub the rind to remove dirt, then dry. Slice the melon into cubes or use a melon baller. Place pieces on a parchment-lined baking sheet and freeze. Then place frozen melon pieces in a freezer container. Just know the texture may change during freezing.

Melons, by themselves are not suitable for canning. In fact, they are a low acid food. There are a couple options to make cantaloupe into pickles or a conserve at [www.canr.msu.edu/uploads/resources/pdfs/melons_(e3250).pdf](http://www.canr.msu.edu/uploads/resources/pdfs/melons_(e3250).pdf). Watermelon rind can be made into pickles also. See [https://nchfp.uga.edu/how/can_06/watermelon_rind.html](https://nchfp.uga.edu/how/can_06/watermelon_rind.html).

Don’t Flunk Food Safety!

School is about to get started again! Plan now if your kids are taking their lunch to school or eating the lunch provided. Here are some tips for packing a food safe lunch.

- Use an insulated container or lunch box to keep food safe until lunchtime. Use ice packs, frozen bottles of water or frozen juice boxes to help keep food cold.

- If packing hot foods, use a separate insulated container. Fill it with boiling water to get it heated before added hot food.

- Check with the school if a refrigerator is available to store cold lunches.

- Choose foods that are safe at room temperature such as whole or dried fruits, single serve fruit cups, baby carrots, cherry tomatoes, hard cheese like cheddar, whole grain crackers, peanut butter (be mindful of food allergies!), or dried meat jerky.

- Don’t forget to wash your hands!


Preserving Melons

Melons are another summer treat! They are best eaten fresh, but there freezing them for later use is an option.