Health & Human Sciences

Deb Arseneau – arseneau@purdue.edu

Fill Your Pantry: Canning Foods at Home

More and more people are taking up gardening and planning to preserve their harvest to enjoy throughout the year. You may be thinking about home canning, but make sure you are following proper methods. Improper canning can result in botulism, a rare but potentially deadly illness caused by a poison most commonly produced by a germ called Clostridium botulinum. The germ is found in soil and can survive, grow and produce a toxin in certain conditions, such as when food is improperly canned. The toxin can affect your nerves, paralyze you and even kill you.



For safe home canning, follow these tips:

- ✓ **Select good quality fruits and vegetables** that are free of disease and mold and not overripe or insect damaged. Choose varieties best suited for canning. Process most vegetables within 6-12 hours of harvesting. Process fruit within one day.
- ✓ **Use a tested recipe.** There is a significant amount of science and chemistry involved in home food preservation. Small variations in recipe measurements of ingredients will impact the quality and safety of products. Tested recipes have been extensively researched to ensure density, viscosity, pH, processing times, and methods to destroy harmful microorganisms and result in a consistent, safe product.
- ✓ **Use only glass jars designed for home canning.** Always inspect jars before using. Jars may become brittle, scratched, cracked, or chipped with repeated use, causing them to break during processing or preventing the lids from sealing.
- ✓ **Use two-piece self-sealing lids.** Never reuse lids. Purchase only what you need for the year.
- ✓ **Use the proper method of canning.** During the canning process, air is driven from the jar, and as it cools a vacuum seal is formed. High temperatures in pressure canning destroy harmful microorganisms and enzymes that can lead to food spoilage.
 - o **Boiling-water bath canning** is appropriate for most fruits, acidified tomato products and pickled foods.
 - Pressure canning is the only recommended method for canning low-acid foods. Low acid foods include almost every vegetable, some fruits, milk, all meats, fish and seafood.
- ✓ **Store canned goods safely.** Remove screw bands, label and date lids and store in a cool, dry, dark location with a temperature between 50 and 70. Use within one-year for best quality.

Safe Recipe Resources

- So Easy to Preserve, 6th Edition: https://setp.uga.edu/
- USDA Complete Guide to Home Canning:
 - https://www.nifa.usda.gov/aboutnifa/blogs/usdas-complete-guidehome-canning
- National Center for Home Food Preservation: https://nchfp.uga.edu/

These low acid foods require processing in a pressure canner for safe preservation:

- Asparagus
- Beans
- Beets
- Carrots
- Corn
- Mixed vegetables
- Mushrooms
- Okra
- Peas
- Meats, Fish, Seafood

- Peppers
- Pumpkin
- Potatoes
- Squash
- Soups
- Spinach & Greens
- Succotash
- Tomatillos
- Winter Squash

For more information, including how-to, tips sheets, videos and detailed instructions for canning, freezing, drying and more, visit the National Center for Home Food Preservation website at https://nchfp.uga.edu/

Sources: https://extension.illinois.edu/sites/default/files/canning_fill_your_pantry_final_2021.08.18_ls.pdf

https://www.cdc.gov/foodsafety/communication/home-canning-and-

botulism.html#:~:text=Always%20use%20proper%20canning%20techniques,to%20see%20if%20it's%20safe!

The Pun'kin Vine Fair Is Almost Here!!!!

I hope you all have been working on items to display at the Pun'kin Vine fair. Entries need to be postmarked by July 1. Enter all you want for the low price of \$5.00!!! Youth, 18 and under, are free. If you miss the early deadline, you can still enter exhibits on entry day, however, there will be shorter lines if you enter early.

- Clean Up Day at the Domestic Arts Building: Tuesday, July 2 from 8:00-11:00 am
- Judging Schedule at the Fair:

Domestic Arts Handcrafted Exhibits:

Entry: 8:00-10:00 am, Saturday, July 6

Judging: 11:00 am, Saturday, July 6

Fine Arts/Photography Exhibits:

Entry: 8:00-10:00 am, Saturday, July 6

Judging: 1:00 pm, Saturday, July 6

All Food Exhibits (canned, jellied, frozen, confections, baked):

Entry: 8:00-10:00 am, Monday, July 8

(Don't forget your recipes!)

Judging: 11:00 am, Monday, July 8 (Canned items should include an index card with information about how you processed your item: boiling water bath, pressure canner,

length of time processed)

Floral Exhibits:

Entry: 8:00-10:00 am, Tuesday, July 9

Judging: 10:30 am, Tuesday, July 9

> ALL Exhibits will be released on Saturday, July 13 from 9:00-10:00 pm.

Building Hostesses/Helpers Needed:

We still need help with entry and judging at the fair on Saturday, July 6. If you can help, please call the Extension Office to sign up for a time. We also need help babysitting the Domestic Arts Building from Tuesday, July 9 through Saturday, July 13. The building is open to fair-goers from 1:00-9:00 pm daily during the fair.







4-H Youth Development

Mercedes Brunton - brunton@purdue.edu

Congratulations, Graduates!

Congratulations and best wishes to the Newton County 4-Hers who are graduating from high school this year:

Stephanie Berenda, Katherine Burdick, Cheyann Cahill, Rylee Fox, Abigail Hamilton, David Hamilton, Hailey Hoskins, Michael Klemme, Cecelia Marter, Natalie Mlynarczyk, Benjamin Neff, Judah Neff, Makenna Schleman, Payten Sikma, Kendra Spiker, Addysen Standish, Micah Turner, Brett Vanderwall, Jocey Vogt, Shelby Warren, and Allison Wood!

Fair Entry Enrollment

Fair Entry is open from June 1st to June 28th

You must go online to http://newtoncountyin.fairentry.com and enter your exhibit for each project in which you are enrolled.

This includes ALL projects, breathing and non-breathing. You will use the same email and password that you use for your 4-H Online profile.

Remember, this process is required for us to check in your exhibit and to ensure all youth will be listed in show programs.

Failure to complete this process by June 28th will result in the following:

- Livestock exhibitors may only exhibit and receive feedback on their animal from exhibition classes. Exhibitors can fully participate in showmanship and auction.
- Non-livestock projects can only receive a blue for their exhibit.



What to Expect at 4-H Project Judging?

A 4-H project is one part of 4-H and only a part of the total learning experience. The exhibit is only one measure of success and achievement. Through judging, 4-Hers can experience self-satisfaction, and a feeling of success from learning about and completing a project. Judging may last several hours and can be a real learning experience.

- You will hear the judge's comments about what is done well and what could be improved about a project.
- Be patient; bring snacks, books, activities if you wait.
- Sometimes, judges are asked to judge more than 1 project: especially true when there 10 or fewer 4-Hers in a given project. Judging for several project may be listed at the same time on the schedule.

Animal Entry and Release Times

Sunday, July 7th

5:30pm-7:30pm- Beef & Sheep Check-In

5:30pm-8:30pm-Horse & Pony Check-In

5:30pm-8:00pm- Goat Check-In

5:30pm-8:00pm-Poultry Check-In

6:00pm-8:00pm- Dairy Check-In

Monday, July 8th

6:00am -12:00pm- Swine Check-In

8:00am-10:00am- Horse & Pony Check-In

8:00am-12:00pm- Beef, Goat, & Dairy Check-In

10:00am-4:00pm- Rabbit and Poultry Check-In

Thursday, July 11th

Lactating Dairy Cows may enter morning of the Dairy Show

Saturday, July 13th

8:00pm-10:00pm- Release of all 4-H Projects

Sunday, July 14th

9:00am-12:00pm- Secondary pick-up time for 4-H Building Exhibits

4-H Night at the Fair

Wednesday, July 10th at 7:00pm



Grandstands

Don't miss out on freebies such as 4-H
Merchandise and Ice Cream Vouchers! The 4-H
Club with the highest percentage of members in
attendance will win a pizza party! Graduating
members will be recognized along with
Outstanding 4-Her Awards, 4-H Volunteer
Awards, and Farm Bureau Tenure Awards.
Please wear/bring your new 4-H T-shirts to get a
county picture!

Barn Clean Up Dates

Horse and Pony Barn- June 30th, 4:00pm Swine- July 3rd, 6:00pm Beef and Dairy Barn- July 3rd, 6:00pm Sheep and Goat Barn- July 2nd, 5:00pm Rabbit- June 27th, 6:00pm Poultry- June 27th, 6:30pm

Newton County Friend of 4-H Award

Who is the leader, Council member or community 4-H supporter who has had a positive effect on you or your 4-H member? Do you know an adult or business who has made a significant contribution in support of Newton County 4-H? Please take the time to thank this person by nominating them for the "Friend of 4-H Award"

Previous winner include:

2018- Scott & Carol Carlson

2019- Scott & Maureen Deno

2021- Sue Frischie

2022- Newton County Government

2023- Pam Latta

Please scan the QR Code or enter the link https://forms.gle/ytnx9aiHDWRgKQDw8 to submit a nomination. Physical forms can also be picked up at the extension office. This form needs to be completed by July 1.



General 4-H Project Reminders and Information

Please reference the Periscope for further project requirements.

Posters are available at the Newton County Extension Office.

Foam Boards (\$4.75)

Plastic Sleeve (\$0.75)

4-H Periscope Cover Contest Rules

Contest Rules:

- Designs may be submitted by a club, family, or individuals.
- Designs must be drawn/ created on a 8 1/2" X 11" sheet of plain paper, portrait (vertical) style.
 For a better copy, drawings should be done with a black felt tip pen.
- You must include "2025 Newton County Periscope" and the 4-H Clover. The use of the 4-H name and clover are protected under federal law and must be used following specific guidelines. Please ask the extension office for these guidelines.
- Designs must be submitted to the Extension Office in the 4-H Building at the Fairgrounds by noon on Saturday, July 6th.
- Designs will be posted in the 4-H Building and voted on by visitors to the building in a People's Choice format. A winner will be selected and notified following the vote.
- Once an individual has won, he or she must sit out for one year. Exception is that they may submit as a family and/or club.
- The winner(s) will receive a plaque during 4-H
 Night at the Fair. The winner's name will be
 added to the larger plaque that hangs on the
 wall in the Extension Office.
- The 4-H Periscope Contest is sponsored by 4-H Council.

Help Needed!!

Help is needed to fill shifts monitoring the 4-H Building, cleaning the grandstands, and helping with the Pork Chop Supper. Please call the Extension Office to sign up!

Grand Stand Clean-Up

Tues., July 9th-9:00am

Busy Beavers

Wed., July 10th-9:00am

North Newton Neighbors

Thurs., July 11th-9:00am

Lincoln Rough Riders

Fri., July 12th-9:00am

Country Hicks

Sat.., July 13th-9:00am

Horse and Pony

Sun., July 14th-9:00am

Help Still Needed

Free Carnival Rides for 4-H Members!

Thank you to the Newton County Government and Newton County Economic Development Commission for sponsoring the carnival rides for all Newton County 4-Hers at the 2024 Pun'kin Vine Fair! More details to come. Passes can be picked at the 4-H building during fair.

Thank you Notes

4-H is a volunteer driven organization, so without our volunteers and donors the activities and programs at the Newton County Pun'kin Vine Fair wouldn't be possible. The donors for trophies or banners will be listed on your award. Please make sure to send them a thank you card!

4-H Project Pick Up/State Fair Exhibits

Project pick up: Saturday, July 13th, Sunday, July 14th

There will be no early release. If you can't pick up at this time, make arrangements with a friend, relative, or club leader to pick them up for you.

All state fair exhibits except for foods, foods preservation, and garden/herbs must be at the Extension Office in Morocco before 4:00pm on July 26th.

Foods, Food Preservation, and Garden/Herb exhibits must be in the Extension Office no later than 7:45 am on Monday, August 5th.

State Fair Tickets

State Fair Tickets will be provided to 4-H members with eligible state fair projects. These passes can be picked up at the Extension Office after fair.

Free Grandstand Passes for 4-H Members and adult volunteers/leaders!

All 4-H members and adult volunteers/leaders will receive ONE pass good for FREE ADMISSION to any grandstand event. Be sure to thank a Fair Board member for your grandstand ticket. Passes can be picked at the 4-H building during fair.



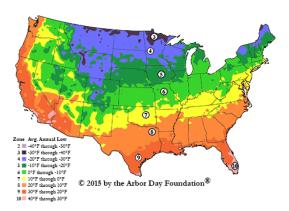
Ag & Natural Resources

Jamie Reed - reed258@purdue.edu

Happy July!

Summer is well underway and I think that we can all feel it. The fair is coming up as well as the temperatures! Growing degree days (GDD) are heat units that are used to estimate the growth and development of certain crops and pests during the growing season. If you've ever looked on the back of a seed packet, you've likely seen a zone map similar to this one.

This tells you when to plant, but it can only give you a vague idea of how fast something will grow, especially with the wild weather that



we can have in Indiana. The basic concept of a GDD is that development will only occur if the temperature exceeds some minimum development threshold, or base temperature (TBASE). The base temperatures are determined experimentally and are different for each organism. To calculate GDDs, you must first find the mean temperature for the day. If the mean temperature is at or below TBASE, then the Growing Degree Day value is zero. If the mean temperature is above TBASE, then the Growing Degree Day amount equals the mean temperature minus TBASE. Accumulated GDD, can be used to track crop (and pest) growth stages and predict when they will be ready for harvest. For example, corn typically reaches maturity around 3,000 accumulated GDD.

GDD = $((max temperature °F + min temperature °F) \div 2) - base temperature °F, where the base temperature is normally either 22, 32 or 50 °F but varies based on the species.$

We will be restarting the Purdue Extension community garden this year, so we can have some practice calculating GDD's with that. If you are interested in helping with this garden, or learning more on an upcoming program called Master Gardener's, please feel free to reach out at any time.



Purdue Ag and Natural Resources Extension has started a new program called 'Purdue On The Farm.' Summer Brown, my counterpart in Jasper County, and I joined this year and have started scouting farmer-approved fields. This program allows us to collect data from around the state, which in turn, encourages researchers to aim their focus on the practices that farmers actually use. Besides the long-term benefit of improved science, the farmer receives free field scouting, soil tests, and tissue sampling. It's a partnership that is beneficial to both parties and offers many involvement opportunities. This is a new program and only includes corn and beans this year, but will hopefully include a variety of crops in the future.

On Wednesday, August 21st, we will be having the annual Pinney Purdue Field Day at the Pinney Purdue Ag Center located ¼ mile north of U.S. Highway 30 on the Porter-LaPorte County Line Road near Wanatah, IN. Our intended audience is farmers and agribusinesses. This annual educational event has drawn the largest attendance of any of the Purdue Ag Center Field Days statewide – well over 300 folks are present for the sponsored lunch. The featured speaker is Dr. Todd Kuethe from the department of agricultural economics. Purdue Extension Specialists will provide the latest research updates and practical information for farmers on timely topics such as corn production, weed management, wildlife damage, and corn and soybean diseases. An evening program will cover fertility and pesticide storage. Private (PARP) and commercial (CCH) pesticide applicator, and Certified Crop Adviser (CCA) credits will be available at both sessions.

Sources: https://extension.psu.edu/understanding-growing-degree-days; https://www.arborday.org/media/zones.cfm; https://

Featured Animal Disease: High Path Avian Influenza



Description: Highly Pathogenic Avian Influenza (HPAI) is a disease that is highly contagious and often deadly in poultry, caused by highly pathogenic avian influenza A (H5) and A (H7) viruses; it is also known as bird or avian flu. HPAI viruses can be transmitted by wild birds to domestic poultry and other bird and animal species

Symptoms: Sudden death without any prior symptoms of illness, lack of energy and appetite, a drop in egg/milk production, soft-shelled or misshapen eggs, swelling of eyelids, combs, wattles, and shanks, purple discoloration of the wattles, comb, and lets, difficulty breathing, nasal discharge, coughing, sneezing, torticollis, incoordination, diarrhea.

History: The most recent surge of highly pathogenic avian influenza started in the South, around Texas and Oklahoma, and has spread since then infecting, avian species, cattle, and even a few humans that work in close proximity with these animals. Michigan dairies are being hit hard, and there have been confirmed avian cases in Indiana as of January.

Prevention and Control: Revisit your biosecurity protocols. Avoid contact with wild birds by covering/enclosing any outdoor feeders, avoid visiting any ponds/streams with pets, etc. Limit travel with your birds to sales, shows, swaps and ensure that you have clean hands and clothes before handling birds. Other strategies can be found on USDA, APHIS, CDC, Extension, or ISDA websites.

Sources: https://www.aphis.usda.gov/sites/default/files/lbms_program_standards_final.pdf;
https://extension.umn.edu/poultry-health/avian-influenza-basics-noncommercial-poultry-flock-owners

<u>Featured Weed: Marestail, Conyza Canadensis</u> (Also known as horseweed)

Description: An annual weed once considered a minor problem, but now emerging as a significant threat, reducing yields up to 40 percent if left uncontrolled. Horseweed is an opportunistic weed found in all corners of the country. It prefers dry, disturbed land.

Life Cycle: Each fall, a single plant can produce 50,000 windborne seeds outfitted with a parasol, thus allowing it to drift far and wide on air currents. Seeds germinate in the fall and plants can overwinter, but they also sprout in the spring and early summer if the soil is moist.

Eradication: Use fall herbicide treatments in fields with a history of problems or where marestail seedlings are observed. Apply effective burndown herbicides in spring. Do not plant into existing stands of marestail. Tillage close to time of planting also effectively removes marestail, but must thoroughly mix the upper few inches of soil and uproot existing plants.

Sources: https://ag.purdue.edu/btny/purdueweedscience/wp-content/uploads/2021/02/marestail-fact-2014-latest.pdf

