



Friday Notes is designed to enhance communication among various agricultural sectors, educators, students, and the public who are interested in a variety of plant, animal, food, and environmental issues. *Friday Notes* advocates the pursuit of credible, unbiased, science-based information. Material contained in linked articles is from the original authors and does not necessarily reflect the views of CAST.

In This Issue....

- [Animal Agriculture News](#)
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- [Plant & Environmental News](#)
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Announcements

The Poultry Science Association will honor their 2023 award recipients at their [annual awards celebration in July](#), with many recipients being associated with CAST University Members.

CAST College Corner

[Purdue University](#) offers cutting edge weed research tour in recent field day.

CAST Social Media

[Visit our website](#)

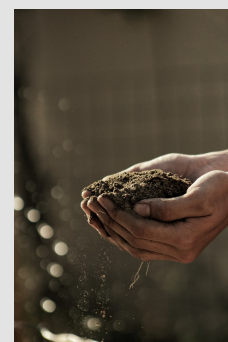


CAST [welcomes ideas](#) for future publications and projects.

June 9, 2023

Soil Health for the Future

Soil is the foundation for all life and is essential for earth and human health. Researchers worldwide are coming together to explore the future of soil health to support critical industries and human health. This includes the National Academies of Sciences work group which is exploring the [linkages between soil health and human health](#).



[The University of Massachusetts Amherst](#) found that 40% of cropland in the Midwest uses no-till to decrease erosion and extend soil fertility in the future. Practices such as no-till, cover crops, and soil moisture management are all ways that producers are working toward healthy soils for the future.

Scientists worldwide have also come together to [advocate for soil microbiomes in the One Health holistic approach](#). This would include making adjustments to systems while factoring in the soil microbiomes as an important part of the overall systems. Bringing soils into the One Health approach acknowledges the reality, that sustainability can not be achieved without healthy soils.

Check out [CAST Agriculture and Microbiome Publication](#) to learn more about this topic.

News and Views

USDA Updates: The USDA (1) made a statement regarding the [US request for a dispute settlement on Mexico's Agricultural Biotechnology Measures](#). (2) [Iowa State University](#) researchers have been awarded a \$649,000 USDA grant to study the intricacies of cereal rye crops. (3) [NIFA invests \\$9.5 million](#) to promote innovation in animal reproduction

Far Side of the Barn

Robot Chef: University of Cambridge researchers have trained a [robot chef to learn from watching cooking videos online](#).



CAST Updates

CAST is Hiring!



Would you—or someone you know—be interested in joining CAST's communications team?

CAST is currently seeking a Communications Manager who will be responsible for planning, implementing, and evaluating effective CAST communications efforts. This includes but is not limited to, overseeing CAST's weekly e-newsletter *Friday Notes*, website, blogs, press releases, and social media platforms. This is a full-time onsite (in Ames, Iowa), hybrid, or remote position. For more information, visit [our website](#), or contact Anne Owens, Director of Council Operations, at aowens@cast-science.org.

Please help us spread the word by sharing this opportunity within your networks and organizations!

CAST Impact Reports on Publications

[Impact data for each CAST publication](#) is tracked and reported at 6, 12, 18, and 24 months after the paper is released. At two years, the impact report is considered "final" and we no longer continue tracking unless there is a special request. Categories that are currently being tracked are release/rollout, press release, comments received, follow-on activities, direct and indirect paper distribution, articles and web mentions, paper citations, and social media.

Here are some recently updated impact reports:

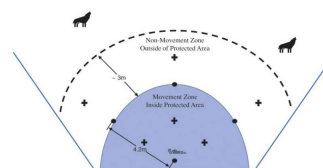
- [The Role of Agricultural Science and Technology in Climate 21 Project](#)
- [Goals, Strengths, and Limitations Governing the Use of Life Cycle Assessment \(LCA\) in Food and Agriculture](#)
- [Gains Foregone by Going GMO Free: Potential Impacts on Consumers, the Environment, and Agricultural Producers](#)

Animal Agriculture and Environmental News

Fuel: [Michigan dairy producers](#) work to find new ways to turn milk by-products into ethanol to be used by drivers in the state.

Cattle: [A Texas feedlot loses 4,000 cattle](#) after, the record "100-year" flooding event last month.

Circovirus: [Merck animal health release a new vaccine for Porcine circovirus](#), that has caused worldwide epidemics and majorly affected the pork industry for the past 20 years.



[New robotic technology is being tested as a predator deterrent in livestock systems, in an attempt to minimize human-wildlife conflict.](#)

Food Science and Safety News

Milk: [Midwest dairy farmers have been forced to dump milk](#) after the processing facility reaches production capacity.

Plant-based dairy: A recent study has shown that [almond and nut-based yogurt has higher nutritional value than dairy-based yogurt](#).
(corrected from June 2nd edition)

Nutrition: [Precise nutrition recommendations](#) for Americans could impact the future of food production.



Food safety is especially important on hot summer days. Check out [these guidelines](#) to keep your family and friends safe this summer.

Plant Agriculture and Environmental News

Plastics: [A recent study reviews the risks and impacts of agricultural plastics](#), on human health, soil, and the environment.

CRISPR: Europe's [opposition to CRISPR technology](#) softens, as politicians look to the future of food security.

Almonds: [California almond growers evaluate what regenerative agriculture](#) could mean for them while focusing on soil health.



New AI technology is being used to kill weeds and harvest crops on American Farms.

International News

China: [Record high temperatures and flooding](#) affect crops and livestock, raising food security concerns.

Europe: [EU exempts a new gene modification technique](#) from existing rules, banning genetically modified organisms.

Mexico: [Mexico counters U.S. dispute to GM corn](#) regulations announced by the Mexican Government earlier this year.



Ukraine fears losing millions of tons of crops after dam collapse.

General Interest

Exports: [Record pork exports continue to soar](#) in the April report, and exports to Mexico expand.

Pollinators: Researchers have shown that [nighttime pollinators may be just as important](#) as pollinators active during the day.

Threats to Agriculture: Cyberattacks are a true danger in the digital era, and [agriculture is one of the greatest targets](#).



[The USDA ramps up urban agriculture funding](#), using the People's Garden in Washington, D.C. as a shining example.

Photo Credits

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Ukraine flooding photo from [REUTERS/Vladyslav Musiienko](#)

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- * Agricultural & Applied Economics Association
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- * American Dairy Science Association
- * American Farm Bureau Federation
- * American Meat Science Association
- * American Meteorological Society, Committee on Agricultural and Forest Meteorology
- * American Seed Trade Association
- * American Society of Agricultural and Biological Engineers
- * American Society of Agronomy
- * American Society of Animal Science
- * American Society of Plant Biologists
- * American Veterinary Medical Association
- * Association of Equipment Manufacturers
- * Aquatic Plant Management Society
- * BASF Corporation
- * Bayer Crop Science
- * Corteva Agriscience
- * CropLife America
- * Crop Science Society of America
- * Global Teach Ag Network
- * Innovation Center for U.S. Dairy
- * Iowa State University
- * Minor Use Foundation, Inc.
- * Mississippi State University
- * National Cattlemen's Beef Association, a Contractor to the Beef Checkoff
- * National Corn Growers Association/Iowa Corn Promotion Board
- * National Milk Producers Federation
- * National Pork Board
- * National Turkey Federation
- * North Central Weed Science Society
- * Northeastern Weed Science Society
- * Nutrients
- * Penn State University
- * Poultry Science Association
- * Rural Sociological Society
- * Society for In Vitro Biology
- * Society for Range Management
- * Soil Science Society of America
- * Syngenta Crop Protection
- * The Fertilizer Institute
- * The Mosaic Company
- * Tuskegee University
- * United Soybean Board
- * University of Nevada-Reno
- * U.S. Poultry and Egg Association
- * Weed Science Society of America
- * Western Society of Weed Science

CAST, through its network of experts, assembles, interprets, and communicates credible, balanced, science-based information to policymakers, the media, the private sector, and the public.

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The Science Source for Food,
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