Council for Agricultural Science and Technology

Kent G. Schescke
Executive Vice President
2019

A Trusted Source for the Science and Technology of Food and Modern Agriculture
CAST

- 501(c)3 nonprofit organization
- Formed in 1972 as a result of a National Academy of Sciences Report (1970)
- Comprised of scientific societies, universities, nonprofits, individuals and company members
- ASA was a founding member
- Based in Ames, Iowa

A Trusted Source for the Science and Technology of Food and Modern Agriculture
The CAST Vision

A world where decision making related to agriculture and natural resources is based on credible information developed through reason, science, and consensus building.

“What CAST does is very important to mankind.”

–Dr. Norman E. Borlaug
The CAST Mission

A Trusted Source for the Science and Technology of Food and Modern Agriculture
What Does CAST Do?

CAST disseminates science-based information through:

- Print materials
- Online sources
- Videos on cast-science.org & YouTube
- Spanish & Chinese translations on select publications

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How Does CAST Do This?

With the help of many volunteer contributors:

• **50 Board Members** representing scientific societies, companies, nonprofits, and universities

• **Nearly 200 active task force members** working on CAST reports yet to be released

• Volunteer scientific experts as authors and reviewers—over **800 volunteers** since 2007

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Unique Formats for Unique Needs

• **Issue Papers.** 8-20 pages; more narrowly focused.

• **Special Publications.** 25-150 pages; often follow-on to workshop.

• **Task Force Reports.** 40-200 pages; comprehensive overview.

• **Commentaries.** 4-8 pages; quick turnaround.

• **Ag quickCASTs.** 1-page excerpts from full CAST publications.
A Life-cycle Approach to Low-invasion Potential Bioenergy Production [February 2016]

Food Waste Across the Supply Chain: A U.S. Perspective on a Global Problem [March 2016]

The Impact of Asynchronous Approvals for Biotech Crops on Agricultural Sustainability, Trade, and Innovation [December 2016]

Plant Breeding and Genetics [March 2017]

Crop Protection Contributions toward Agricultural Productivity [April 2017]

Why Does Bee Health Matter? The Science Surrounding Honey Bee Health Concerns and What We Can Do About It [June 2017]
2018 Publication Rollouts

Regulatory Barriers to the Development of Innovative Agricultural Biotechnology by Small Businesses and Universities [March 2018]

Scientific, Ethical, and Economic Aspects of Farm Animal Well-being [April 2018]

Omega-3 Fatty Acids: Health Benefits and Dietary Recommendations [May 2018]

Genome Editing in Agriculture—Methods, Applications, and Governance [July 2018]


Food Loss and Waste [September 2018]

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2019 Publication Rollouts

- Aquifer Depletion and Potential Impacts on Long-term Irrigated Agricultural Productivity [February]
- Enabling Open-source Data Networks in Public Agricultural Research [March]
- Reducing the Impacts of Agricultural Nutrients on Water Quality across a Changing Landscape [April]
- Spanish translation of Gene Flow in Alfalfa: Biology, Mitigation, and Potential Impact on Production [September]
Other Forthcoming Publications


Interpreting Agricultural Chemical Residues Measured in Food or Milk [October 21, 2019 rollout]

The Microbiome’s Positive Impacts on Crops [November 2019]

Impact of Recruitment and Retention of Food Animal Veterinarians on U.S. Food Supply [December 2019]

GMO Free—The Impact on Consumers, Retailers, Farmers, and the Environment [Early 2020]

Ground and Aerial Robots for Agricultural Production: Opportunities and Challenges [Early 2020]
Forthcoming Publications—Plant

- Integrated Pest Management (IPM) Programs Protect Human Health, Environmental Sustainability, and the Economy
- Irrigation and Precision Crop Management Technologies
- Recruiting and Educating Graduate Students to Become Researchers and Leaders in Global Agricultural Studies
- The Impact of CAST—50 Years of Influence in Agriculture
- The Need and Challenge for Effective Stewardship of New Pest Management Technologies in Agriculture
- RNA Interference Technology in Agriculture: Methods, Applications, and Governance

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Forthcoming Publications—Animal

- Antibiotic Use in Animal Agriculture: Impact on Animals, Consumers, and Antibiotic Resistance
- Impacts on Human Health and Safety of Naturally Occurring and Supplemental Hormones in Food Animals
- Social and Economic Impact of Misinformation in Agriculture
- Technologies on the Shelf—A Series Keynote Paper
Forthcoming Publications—Food

• A Review of the Economic and Environmental Impacts of International Trade
• Conventional and Organic Food Production: Food Quality and Safety
• Food Biofortification—Reaping the Benefits of Science to Overcome Hidden Hunger
• Gluten Tales and Truths
• Pesticides in the Diet of Infants and Children: Scientists’ Review
• Producing Food Products from Cultured Animal Tissues
• Review of Mycotoxin Impacts: Balancing Economic Costs with Animal and Human Health Adverse Effects Worldwide
• Scientific Evidence for the Risk/Benefits of Raw Milk
• Surfactants in Agriculture

A Trusted Source for the Science and Technology of Food and Modern Agriculture
Free Webinar

September 19 • 11:00 AM CT
An American Society of Agronomy Webinar on CAST Issue Paper

Reducing the Impacts of Agricultural Nutrients on Water Quality across a Changing Landscape

Speaker: Heidi Peterson, VP—Ag Research and Conservation, Sand County Foundation

Free to all Registrants! Watch Live or Later!

Sponsored by the Council for Agricultural Science and Technology (CAST) with funding provided by the United Soybean Board (USB)

A Trusted Source for the Science and Technology of Food and Modern Agriculture
The Borlaug CAST Communication Award

• Annual award in honor of Dr. Norman Borlaug
• Expert in agricultural, environmental or food sectors
• Contribute to the advancement of science communications in the public policy arena.

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Borlaug CAST Communication Award
Building a Legacy of Excellence

Matlock (2018)
Lusk (2017)
Folta (2016)
Prakash (2015)
Van Eeenennaam (2014)
Simmons (2013)
Winter (2012)
Bertini (2011)
Adesina (2010)

A Trusted Source for the Science and Technology of Food and Modern Agriculture
Frank Mitloehner
Professor and Air Quality Extension Specialist
Department of Animal Science
University of California, Davis

“[A] world leader in the science of the environmental impact of animal agriculture.”
CAST Welcomes Your Suggestions

Submit an idea!
Do you have an idea for a CAST publication, video, or project you would like to share?

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CAST®
Friday Notes

- Published **48 times** each year
- Lead articles on timely topics being discussed in agriculture
- More than 60 current ag news items selected from 100+ sources, including links to original articles
- An international section
- Legislative and regulatory updates from Washington, D.C.
CAST Social Media

CAST expands its outreach through the active use of social media

Blog
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CAST Website

Visit CAST Online
www.cast-science.org

Free access to CAST materials for individuals with a “.gov” address.

The CAST website has had visitors from every U.S. state and 181 countries.

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