CAST Issue Paper 70

Ground and Aerial Robots for Agricultural Production: Opportunities and Challenges
Released November 16, 2020

Chair: Santosh Pitla, University of Nebraska-Lincoln; 21-member task force

Release/Rollout
The CAST Issue Paper, “Ground and Aerial Robots for Agricultural Production: Opportunities and Challenges,” was released on November 16, 2020. On November 17, task force chair, Dr. Santosh Pitla presented highlights of the paper followed by a Q&A session with a panel of five authors—Dennis Buckmaster, Tami Brown-Brandl, Todd Janzen, Michael Sama, and Scott Shearer. There were 604 registrants for the webinar and 319 unique viewers attending on Zoom.

- Webinar Video—269 views as of May 16, 2021
- Link to commentary, Ag quickCAST, student study guide, webinar video, and Q&A.

In-kind Contributions: 270 volunteer hours; $19,980 monetary value

Press Release (results two weeks after release)

- Distributed through Constant Contact, PRWeb, and the CAST website.
- Press release went to 10,169 e-contacts resulting in 4,723 opens
- 105 views of the press release from the CAST website as of May 16, 2021.
- The press release through PRWeb resulted in 3,058 views and reached 975 targeted influencers (journalists/bloggers).

Follow-On Activities

American Society of Agronomy/Soil Science Society of America, 1 CEU for professional development was offered to certified crop advisors for watching the webinar.

This report last updated May 16, 2021.
National Association of Agricultural Educators, Communities of Practice – blog posts in “online/distance learning resources” including a summary of the publication, Ag quickCAST, and student study guide attachment (82 views)

Paper Distribution
Paper Distribution (print and online access from CAST website) 6 months after release –2,146

Indirect Paper Distribution
AgriTech Tomorrow, White Papers
https://www.agritechtomorrow.com/whitepapers.php

Ministry of Science and Technology (Taiwan)
https://outlook.stpi.narl.org.tw

University of Nebraska-Lincoln, DigitalCommons@University of Nebraska
https://digitalcommons.unl.edu/biosysengfacpub/727/
https://digitalcommons.unl.edu/cgi/viewcontent.cgi?article=1732&context=biosysengfacpub

Articles and Web Mentions

AgriNews, Machines of the future: Robots give farmers a helping hand, Martha Blum, December 18, 2020

https://www.farmweeknow.com/eedition/page-a11/page_cc99931d-5bda-5a82-b97e-3651647903a0.html
https://www.farmweeknow.com/profitability/can-robots-solve-agricultural-workforce-availability-issues/article_3bb62b2e-29d0-11eb-940d-23c0f7817d49.html

GrainNet, Robots in Agriculture: Council for Agricultural Science and Technology Outlines Opportunities, Challenges, November 20, 2020


National Grain and Feed, Robots in agriculture: CAST outlines opportunities and challenges, Sarah Gonzalez, November 20, 2020 Newsletter

Purdue University, ABE News, December 2020
https://engineering.purdue.edu/ABE/aboutus/Newsletter/December2020ABeNotes

This report last updated May 16, 2021.
Texas Farm Bureau, Texas Agriculture Daily, Challenges, opportunities to adopting robots in ag, Jennifer Dorsett, December 9, 2020 (with link to paper)  
https://texasfarmbureau.org/challenges-opportunities-to-adopting-robots-in-agriculture/


Citations

Social Media

Twitter—
@JanzenLaw, November 16, 2020  
https://twitter.com/JanzenLaw/status/1328408607310958593  
1 retweet, 3 likes

@AgriTechTmrw, November 16, 2020  
https://twitter.com/AgriTechTmrw/status/1328383140524666881  
1 like

@GregDahl8, November 17, 2020  
https://twitter.com/GregDahl8/status/1328782589608529922  
1 retweet, 3 likes

@FutureOfAg, November 17, 2020  
https://twitter.com/FutureOfAg/status/1328623734467465216

@MichaelKirkby, November 17, 2020  
https://twitter.com/MichaelKirkby/status/1328807910558867458

@CASTagScience, November 19, 2020  
https://twitter.com/CASTagScience/status/1329436811584827393  
3 retweets, 3 likes

@UNL_IANR, December 8, 2020  
https://twitter.com/UNL_IANR/status/1336325374423126016  
1 retweet, 4 likes

@Syed_Meesam_Ali, December 9, 2020  
https://twitter.com/Syed_Meesam_Ali/status/1336868098020937734

@CASTagScience, January 27, 2021  
https://twitter.com/CASTagScience/status/1354497026071928836  
2 retweets, 4 likes

@CASTagScience, April 8, 2021  
https://twitter.com/CASTagScience/status/1380194594982408200  
3 retweets, 4 likes

This report last updated May 16, 2021.