



AMERICAN **DAIRY SCIENCE** ASSOCIATION

**NORTHEAST**

AMERICAN SOCIETY OF **ANIMAL SCIENCE**



---

**ASAS Northeast Section/ADSA Northeast Branch  
2021 Virtual Joint Meeting • April 6-7, 2021**

---

**APRIL 6, 2021**

**Session I: Extension During a Pandemic**

- 2:00–2:05 PM      President's Welcome  
Dr. Chad Dechow - Pennsylvania State University
- 2:05–2:45 PM      *Responding to cooperative imposed milk production limits*  
**Mr. Robert Goodling - Pennsylvania State University**
- 2:45–3:00 PM      Break
- 3:00–4:15 PM      Open poster session
- 4:20–5:00 PM      *Creating extension opportunities during chaos*  
**Dr. Bonnie Burr - University of Connecticut**
- 5:00–5:15 PM      Break
- 5:15–6:40 PM      Graduate student poster contest

**APRIL 7, 2021**

- 8:30–9:00 AM      Awards and coffee

**Session II: Advances in Feed Efficiency**

- 9:05–9:45 AM      *Genetic basis of feed efficiency and national dairy cattle evaluation*  
**Dr. Lydia Hardie - Pennsylvania State University**
- 9:50–10:30 AM      *Results from a long-term feed efficiency selection experiment in swine*  
**Dr. Jack Dekkers - Iowa State University**
- 10:30–10:45 AM      Coffee break
- 10:45–11:25 AM      *Physiological basis of feed efficiency in sheep*  
**Dr. Melinda Ellison - University of Idaho**
- 11:30 AM–12:10 PM      Feed efficiency panel discussion
- 12:15–12:20 PM      President's closing remarks  
Dr. Chad Dechow - Pennsylvania State University



AMERICAN **DAIRY SCIENCE** ASSOCIATION  
**NORTHEAST**  
AMERICAN SOCIETY OF **ANIMAL SCIENCE**



## POSTER SESSIONS

### Open Poster Session – 3:00 – 4:15 PM

*A comparison of feedlot growth and performance of beef x Holstein crossbred steers and Holstein steers; Bailey L. Basiel, Pennsylvania State University*

*Machine Learning Approaches for Animal Welfare, Thomas Chen, Academy for Mathematics, Science and Engineering*

*Effects of once per day milking of late lactation cows on yield, dry matter intake, udder tension; George DeMers, Pennsylvania State University*

*Genomic selection for maternal ability in Large White sows; Breno Fragomeni, University of Connecticut*

*A forage-based educational needs assessment for livestock and forage producers in Maryland; Amanda Grev, University of Maryland*

*Some two loci covariances between breeding values under recombination, Roberto Saavedra; Universidad de Buenos Aires*

*Long non-coding RNA expression profile associated with gastrointestinal nematode infection in divergent immune response sheep; Olivia Willoughby, University of Guelph*

### Graduate Poster Contest – 5:15-6:40 PM

#### **M.S.**

*Long non-coding RNA expression profile associated with gastrointestinal nematode infection in divergent immune response sheep; Olivia Willoughby, University of Guelph*

*Genome-wide association study for heat stress tolerance in swine using weighted single-step GBLUP; Gabrielle Dodd, University of Connecticut*

## **Ph.D**

*Novel lncRNA expressed in milk somatic cells of Holstein dairy cows associated with mastitis disease; Victoria Asselstine, University of Guelph*

*A genome-wide association study of horn fly resistance in organic Holstein cattle; Bailey Basiel, Pennsylvania State University*

*Evaluation of the differences between two fecal egg count procedures and estimation of the genetic parameters for gastrointestinal parasite resistance traits in sheep; Mohammed Boareki, University of Guelph*

*Effects of genetic lineage and mild heat stress on ghrelin concentrations of pregnant Holstein heifers; Han Longfei, Pennsylvania State University*

*Genotypes from different immune cell lineages and comparison to hair, dam and colostrum genotypes in a newborn calf; Tanya Muratori, Pennsylvania State University*

*Maternal nutrient restriction and re-alimentation influences liver and muscle tissue development and gene expression; Brandon Smith, University of Connecticut*

*Impact of pasture-based diets on rumen performance as assessed by continuous culture; Miriam Snider, University of Vermont*

*Transcriptome profile comparison between two divergent seasonal temperatures associated with bovine preimplantation pregnancy outcome; Hannah Swett, University of Guelph*

*Effects of poor maternal nutrition during gestation on lamb growth and feed efficiency; Nicole Tillquist, University of Connecticut*



## **MR. ROBERT GOODLING**

**Pennsylvania State University**

Mr. Robert Goodling is currently an Extension Associate in the Department of Animal Science and a member of the Penn State Extension Dairy Team. His primary focus is farm and data management and record keeping. Rob was raised in portions of central and southern Pennsylvania. Rob attended Penn State University from 1997 to 2001, graduating with a degree in Animal Science, Science Option. He then obtained a Master's Degree in Dairy Science from the University of Wisconsin-Madison. Rob's masters work was in the field of dairy genetics. Upon graduating from UW in January 2004 and before joining the Department in April 2011, Rob worked for the Animal Improvement Programs Laboratory, an ARS-USDA office responsible for dairy cattle genetic evaluations and selection research, and was the Dairy Extension Educator in Lebanon County from 2004 to 2011. Rob's family is still actively involved with the dairy & crop industry both here in PA and in WI. He resides in Bellefonte, PA with his wife Erin, and their two sons, Robert and Lincoln.



## **DR. BONNIE BURR**

**University of Connecticut**

In 2009 Dr. Bonnie Burr began working for the UConn College of Agriculture, Health and Natural Resources where she serves as Department Head and Assistant Director of UConn Extension. She works on agricultural policy as well as 4-H and dairy programming when not carrying out administrative duties. She was appointed by Governor Ned Lamont to the CT State Board of Education's agricultural education seat in 2020. In 2017 she was appointed by Secretary of Agriculture Sonny Perdue to chair the USDA Farm Service Agency (FSA) State Committee. In 2007 she was appointed by President George HW Bush to serve as CT/RI State Executive Director of the USDA Farm Service Agency through 2009. Dr. Burr served as Director of Government Relations at CT Farm Bureau from 2000-2007. She was the 2006 National Distinguished Alumni Leader of the Young Dairy Leaders Institute and served as the 2005 President of the National Dairy Shrine. She is a recipient of the New England Holstein Distinguished Service Award and has been involved with Holstein USA having served on their Nominating, Governance and Animal Identification Committees. Dr. Burr serves as a CT Trustee of the Eastern States Exposition and is Co-Supt of their Big E Dairy Show. She was raised on a dairy farm and while they no longer milk cows she continues to raise Holstein and Jersey heifers as well as angora cross goats.



**DR. LYDIA HARDIE**  
Pennsylvania State University

The involvement of Dr. Lydia Hardie in the dairy industry has been lifelong. Raised on small dairy farm near Blair, WI, she completed her undergraduate and master's degrees at the University of Wisconsin – Madison and PhD at Iowa State University. Her graduate research centered on the genetics of feed efficiency as part of a multi-state project focused on improving feed efficiency in dairy cattle. She was actively involved in many facets of feed efficiency research from feeding cows and managing data collection teams, to exploring indicator traits such as heat loss and performing genomic analyses using data from thousands of cows. These data now form the basis for the feed efficiency reference population used in national genetic evaluations for feed efficiency in the US. Most notable, her research illustrated the role of diet on characterizing the genetics of feed efficiency and identified key regions of the genome impacting feed efficiency. Lydia is currently completing postdoctoral work at Penn State University studying the genetics of health in organic dairy cows and participates in teaching undergraduate genetics courses.



**DR. JACK DEKKERS**  
Iowa State University

Dr. Jack C. M. Dekkers is a C.F. Curtiss Distinguished Professor at in the Department of Animal Science of Iowa State University. Dr. Dekkers grew up in the Netherlands and received B.Sc. and M.Sc. degrees from the Wageningen Agricultural University and a Ph.D. from the University of Wisconsin in Animal Breeding. From 1989 to 1997 he was on faculty at the University of Guelph, working closely with the Canadian industry on genetic improvement of dairy cattle. He moved to Iowa State University in 1997 and has been the Leader of the Department's Animal Breeding and Genetics group since 2012. Current research focuses on the genetic basis of feed efficiency and health in pigs and poultry, and on the integration of quantitative genetics and genomics in breeding programs.



## **DR. MELINDA ELLISON**

**University of Idaho Nancy M. Cummings  
Research, Extension, and Education Center**

Dr. Melinda Ellison is based in Salmon, Idaho at the University of Idaho Nancy M. Cummings Research, Extension, and Education Center where she serves as the Extension Range Livestock and Sheep specialist. Her research program focuses on livestock grazing behavior and associations between livestock grazing management, rangeland health, and wildlife habitat. She received her doctorate from the University of Wyoming under the direction of Dr. Kristi Cammack, where her research investigated relationships between sheep microbiome and feed efficiency.