

## **Geoffrey E. Dahl, Ph.D.**

### Educational Background

- 1981-1985 B.S. (Animal Science; Minor: Agricultural Economics), University of Massachusetts, Amherst, MA
- 1985-1987 M.S. (Dairy Science), Virginia Polytechnic Institute & State University, Blacksburg, VA
- 1987-1991 Ph.D. (Animal Science), Michigan State University, East Lansing, MI

### List of Academic Positions Since Final Degree

- 1991-1994 Research Fellow, Reproductive Sciences Program, University of Michigan, Ann Arbor.
- 1994-1996 Assistant Professor, Department of Animal Sciences, University of Maryland, College Park.
- 1997-2000 Assistant Professor, Undergraduate Program Coordinator, Department of Animal & Avian Sciences, University of Maryland, College Park.
- 2000 Associate Professor, Undergraduate Program Coordinator, Department of Animal & Avian Sciences, University of Maryland, College Park.
- 2000-2005 Associate Professor, Extension Dairy Specialist, Department of Animal Sciences, University of Illinois, Urbana-Champaign.
- 2003-2006 Director, Cross Campus Food Security Initiative, University of Illinois, Urbana-Champaign.
- 2005-2014 Professor, Extension Dairy Specialist, Department of Animal Sciences, University of Illinois, Urbana-Champaign (adjunct status after 8-16-06).
- 2006 Affiliate, Beckman Institute, University of Illinois, Urbana-Champaign.
- 2006-2018 Professor and Chair, Department of Animal Sciences, University of Florida, Gainesville.
- 2018-present Harriet B. Weeks Professor, Department of Animal Sciences, University of Florida, Gainesville.
- 2019 (Jun/Jul) Visiting Scholar, Department of Veterinary Medicine, University of Bari-Aldo Moro, Bari, Italy.
- 2023-present Director, USAID Feed the Future Innovation Lab for Livestock Systems, University of Florida, Gainesville.
- 2024-25 Jean D'Alembert Fellow, University of Paris-Saclay and INRAe, Jouy-en-Josas, Paris, France.

### Other Professional Employment

- 1985-1987 Graduate Research Assistant, Department of Dairy Science, Virginia Polytechnic Institute & State University, Blacksburg, VA.
- 1987-1991 Graduate Research Assistant/Fellow, Department of Animal Science, Michigan State University, East Lansing, MI.

## Recent Administrative Experience and Select Accomplishments

### **University of Florida, Gainesville**

*Director, USAID Livestock Systems Innovation Lab, (2022-Acting; 2023-present)*

- Report administratively to the Senior Vice President of Agriculture and Natural Resources.
- Responsible for leadership of technical aspects of the lab with oversight of ~45 projects across 8 FtF countries.
- Supervise 11 staff to support internal and external needs of the Management Entity that is funded by USAID and Bill and Melinda Gates Foundation (BMGF) to improve access and production of Animal Source Foods in 8 FtF countries.

Selected accomplishments:

- PI on Haiti Mission Associate award of \$4,000,000 (5 years) for “Système d’Innovation en Production Animale (SIPA)”.
- Secured USAID/RFS Associate award of \$2,000,000 (3 years) to implement the One Health Approaches to mitigate brucellosis in East Africa.
- PI on “Precision Livestock Farming in Tanzania” \$2,200,000 grant from BMGF (2 years) to establish a precision livestock farming hub at Nelson Mandela African Institution of Science and Technology in Arusha, Tanzania.
- Spearheaded efforts to increase the funding ceiling of LSIL by \$9.5 million in support of Poultry Genomics work in Ghana and Tanzania and initiatives in Niger around livestock market development.

*Chair, Department of Animal Sciences, (2006-2018)*

- Reported administratively to the Senior Vice president of Agriculture and Natural Resources and programmatically to the Deans of Research, Extension and the College of Agricultural and Life Sciences.
- Responsible for leadership of research, teaching and extension programs with a focus on the forage consuming livestock species and their products.
- Oversaw a faculty and staff salary budget of \$6,000,000 annually, and direct operating budget of \$1,000,000.
- Directly supervised ~40 faculty in Gainesville and at two outlying Research and Education Centers, and had responsibility for approximately 100 staff at various locations, including 1 dairy, 2 horse and 2 beef farms, along with on-campus teaching farms.

Selected accomplishments:

- Hired 30 tenure track faculty including 2 Preeminent faculty (Campus wide program).
- Spearheaded state initiative that provided an additional \$2.24 million in recurring funding to that base budget for support of 10 additional faculty, and 16 staff positions.
- Led request for \$3.2 million in two phases for renovation of Beef Teaching Unit facilities on campus.
- Grew enrollment from 500 to 600 undergraduates and 60 to 75 graduate students in Animal Sciences and the interdisciplinary Animal Molecular and Cellular Biology (AMCB) graduate programs.
- Oversaw application and approval of PhD program designation for AMCB.
- Initiated “Guided Extension” course to meet PhD training requirements in Animal Sciences.
- Recruited leadership and led proposal development for USAID Feed the Future Innovation Laboratory for Livestock Systems.
- Southeast Milk Check-Off funding program management; distributed ~\$300,000 annually for dairy research and extension in FL, GA, TN, AL, and SC.
- Departmental leadership for input to Florida Cattlemen’s Association with planning and development of beef applied research and education competitive fund.
- Effective stewardship of approximately \$10,000,000 in endowment funding, and with direct increase of \$2,000,000 during my tenure as Chair. Secured an additional \$1.5 million deferred gift, and initiated an ongoing effort to raise \$1,000,000 in funding as a source of permanent support for student experiential learning.

### **University of Illinois, Urbana-Champaign**

*Cross Campus Food Security Initiative (2003-06)*

- Reported administratively to the Vice President for Research

Selected accomplishments:

- Led development of interdisciplinary research initiative centered on new technologies to protect agricultural and food system elements from field to fork.
- Successful application to Deere & Co. for 3 years of support of the project.

#### *UI On-line Dairy Certificate Program (2003-06)*

- Reported administratively to the Head of Animal Sciences and programmatically to the Director of On-line Education
- Coordinated student recruitment and communications, advising, for approximately 75 students across 5 courses annually.

#### Selected accomplishments:

- Led development of 5 fully on-line courses to support a certificate of dairy science; received approval of certificate program status.
- PI on USDA-HEC grant for lactation class development and delivery.

#### **University of Maryland, College Park**

##### *Undergraduate Program Coordinator (1996-2000)*

- Reported administratively to the Chair of Animal Sciences
- Oversaw advising for ~220 undergraduates, including advisor of 35 students personally.
- Coordinated course changes, revisions and new course development.

#### Selected accomplishments:

- Spearheaded engagement with Regional Land Grant Institutions to coordinate collaborative teaching and extension programming; funded by Kellogg Foundation grant.
- PI on USDA-HEC grant for development of regional internship database and delivery of multi-institution career seminar course.

#### Professional Honors, Recognitions, and Outstanding Achievements

##### *Fellowships*

1. J. L. Pratt Animal Nutrition Assistantship, Virginia Polytechnic Institute & State University, Blacksburg, (1985-87).
2. Graduate Recruiting Fellowship, Michigan State University, E. Lansing, (1987-88).
3. Postdoctoral Fellowship, National Institutes of Health, Reproductive Endocrinology Training Grant, Reproductive Sciences Program, University of Michigan, Ann Arbor, (1991-92).
4. Postdoctoral Fellowship, National Institutes of Health, National Research Service Award, Reproductive Sciences Program, University of Michigan, Ann Arbor, (1992-94).
5. Jean D'Alembert Fellow, University of Paris-Saclay, BREED - Biologie de la Reproduction, Environnement, Epigénétique, et Développement laboratory of INRAe, Jouy, France, (2023-2025).

##### *Awards and Honors*

1. Lilly Travel Grant (Michigan State University, 1990).
2. Merck, Sharpe & Dohme Outstanding Graduate Student Award (Michigan State University, 1991).
3. ADEC Educational Infrastructure Builder Award (Annual Distance Teaching and Learning Conference, PCO/Program Panel, Madison, Wisconsin, 1998).
4. Agway Inc. Young Scientist Award (American Dairy Science Association, 1999).
5. Excellence in Instruction Award, College of Agriculture & Natural Resources Alumni Association (University of Maryland, 1999).
6. Lilly-Center for Teaching Excellence Teaching Fellow (University of Maryland, 1999-2000).
7. Outstanding or Innovative Program – Team Award (University of Illinois Extension, 2003).
8. G. R. Carlisle Award for Excellence in Extension Teaching (Department of Animal Sciences, University of Illinois, 2004).
9. Merial Dairy Management Research Award (American Dairy Science Association, 2004).
10. Fellow in Academic Leadership, Committee on Institutional Cooperation (University of Illinois, 2005-2006).
11. University of Illinois, Urbana-Champaign Campus Award for Excellence in Off-Campus Teaching (2006).
12. H.H. Mitchell Award for Excellence in Graduate Teaching and Research (Department of Animal Sciences, University of Illinois, 2006).
13. Outstanding or Innovative Program – Team Award for the UI On-Line Dairy Certificate Program (University of Illinois Extension, 2006).
14. Pfizer Animal Health Physiology Research Award (American Dairy Science Association, 2008).
15. Mentor of the Year Award (Animal Sciences Graduate Student Association, Department of Animal Sciences, University of Florida, 2010).
16. West Agro, Inc. Award (American Dairy Science Association, 2014).
17. Fellow, Food Systems Leadership Institute, (North Carolina State University-Ohio State University-Cal Poly, 2015-2017).
18. H. Allen Tucker Lactation and Endocrinology Award (American Society of Animal Science, 2017).

19. Outstanding Alumni Award, Department of Dairy Science, Virginia Tech. Blacksburg, VA. (2019).
20. Animal Physiology and Endocrinology Award (American Society of Animal Science, 2020).
21. Elected Fellow, American Association for the Advancement of Science (AAAS, 2020).
22. Award of Honor, American Dairy Science Association (ADSA, 2021).
23. Fellow, American Society of Animal Science (ASAS, 2023).
24. Fellow, American Dairy Science Association (ADSA, 2023).
25. H. Allen and Ann Tucker Lectureship (Michigan State University, 2023).

#### *Honor Societies*

1. Sigma Xi (Michigan State University, 1991).
2. Golden Key National Honor Society (University of Maryland, Honorary Member, 1997).
3. Gamma Sigma Delta (University of Maryland, 2000).
4. Omicron Delta Kappa (University of Maryland, Honorary Member, 2000).

#### Invited Lectures and Invited Conference Presentations (since 2000)

#### *National Conferences*

1. "Photoperiodic management of dairy cows." Dairy Housing and Equipment Systems Conference, Nat. Res., Agric., and Engin. Serv., Camp Hill, PA. February, 2000.
2. "Photoperiod control improves production and profit in dairy cows". 5<sup>th</sup> Western Dairy Management Conference, Las Vegas, NV. April, 2001.
3. "Lighting the way to optimal cow performance". 35<sup>th</sup> Annual Conference of the American Association of Bovine Practitioners, Madison, WI. September, 2002.
4. "Photoperiod and immune function in dairy cows". 5<sup>th</sup> International Dairy Housing Conference, American Society of Agricultural Engineers and the 42<sup>nd</sup> Annual Meeting of the National Mastitis Council, Ft. Worth, TX. January, 2003.
5. "Let There Be Light: Photoperiod Management for Production and Health". World Dairy Expo Seminar Series, Madison, WI. September, 2004.
6. "Photoperiodic effects on the transition dairy cow". Extension Education Symposium, ADSA-ASAS-CSAS Annual Meeting, Cincinnati, OH. July, 2005.
7. "Increased Milking Frequency: Considerations for Implementation". 38<sup>th</sup> Annual Conference of the American Association of Bovine Practitioners, Salt Lake City, UT. September, 2005.
8. "Effects of short day photoperiod on mammary growth of dry cows: Altered prolactin and IGF signaling". Growth and Development Symposium, ADSA-ASAS Joint Annual Meeting, Minneapolis, MN. July, 2006.
9. "Effects of photoperiod on mammary gland development and lactation". Lactation Biology Symposium, ADSA-ASAS Joint Annual Meeting, New Orleans, LA. July, 2011.
10. "Photoperiod management of dairy cattle: considerations and applications". ADSA Southern Section Symposium, ADSA-ASAS Joint Annual Meeting, Kansas City, MO. July, 2014.
11. "Effects of late gestation heat stress on immunity and performance of calves". Animal Health Symposium, ADSA-ASAS Joint Annual Meeting, Orlando, FL. July, 2015.
12. "Effects of late gestation heat stress on the physiology of dam and daughter". 13<sup>th</sup> Western Dairy Management Conference, Reno, NV. February, 2017.
13. "Effects of late gestation heat stress on the physiology of dam and daughter". Dairy Cattle Reproduction Consortium Annual Meeting, Reno, NV. November, 2017.
14. "Heat stress mitigation and impacts on dairy cattle behavior and performance". Dairy Cattle Welfare Symposium, Phoenix, AZ. May, 2018.
15. "Dry period heat stress: effects on dam and daughter". Dairy Calf and Heifer Conference, Madison, WI. April, 2019.
16. "Environmental effects on mammary immunity and health". Lactation Biology Symposium, ADSA Annual Meeting. June, 2021.
17. "Maximizing cooling resources in targeted areas". 15<sup>th</sup> Western Dairy Management Conference, Reno, NV. November, 2021.
18. "Maximizing cooling resources in targeted areas". Georgia Dairy Conference, Savannah, GA. January, 2022.

#### *International Conferences*

1. "Photoperiod management of dairy cattle." 7<sup>th</sup> Ontario Large Herd Operators Symposium, Toronto, Canada. February, 2001.
2. "Effect of photoperiod on growth, reproduction and health in dairy cattle" and "Manipulation of photoperiod to increase milk production in dairy cattle." Two presentations at the 4<sup>th</sup> Simposio Internacional de Reproduccion Animal, Cordoba, Argentina. June, 2001.

3. "Environmental Effects on Endocrine and Immune Function in Cattle." Invited presentation in the "Large Mammals as Neuroendocrine Models" Symposium at the 8<sup>th</sup> International Theriological Congress, Sun City, South Africa. August, 2001.
4. "Who turned the lights out? Managing lighting for profit and performance" and "Frequent milking in early lactation: Does it pay?" Two presentations to the Dairy Farmers of Nova Scotia at the annual meeting held in Dartmouth, NS, Canada, April, 2002.
5. "Management of Photoperiod in the Dairy Herd for Improved Production and Health" 6<sup>th</sup> International Workshop on the Biology of Lactation in Farm Animals (BOLFA), Quebec City, Canada, July, 2002.
6. "Who turned the lights out? Managing lighting for profit and performance" and "Frequent milking in early lactation: Does it pay?" Two presentations at the 21<sup>st</sup> Western Canadian Dairy Seminar, Red Deer, AB, Canada, March, 2003.
7. "Efficiency of Milking Frequency: 2X, 3X, 4X or the Combination" Expo Leche, Acapulco, Mexico, November, 2004.
8. "Increased Milking Frequency: Considerations for Implementation" and "Lighting for Production and Health in Dairy Cows" DIGAL Conference, Delicias, Chihuahua, Mexico, September, 2005.
9. "Increased Milking Frequency: Considerations for Implementation" and "Lighting for Production and Health in Dairy Cows". Two invited presentations at ANEMBE, Zaragoza, Spain, May, 2006.
10. "Effects of short day photoperiod on prolactin signaling of dry cows: A common mechanism among tissues and environments?" Invited presentation at 8<sup>th</sup> International Workshop on the Biology of Lactation in Farm Animals (BOLFA), Pirassununga, SP, Brazil, August, 2006.
11. "Photoperiod and thermal effects during the transition period" Invited presentation at the 18<sup>th</sup> ADSA Discover Conference on Food Animal Agriculture, "Effect of Thermal Environment on Nutrient and Management Requirements of Cattle", Nashville, IN, November, 2009.
12. "Photoperiod effects on production and health". XIV Curso "Novos Enfoques na Produção e Reprodução de Bovinos", Uberlândia, MG, Brazil, March, 2010.
13. "Effects of dry period heat stress on production and health". XIV Curso "Novos Enfoques na Produção e Reprodução de Bovinos", Uberlândia, MG, Brazil, March, 2010.
14. "Frequent milking in early lactation: biology and management". Invited presentation at the 3rd International Symposium on Dairy Cow Nutrition and Milk Quality, Beijing, China, May, 2013.
15. "Programming effects of heat stress", 51<sup>st</sup> Annual Meeting of the Brazilian Society of Animal Science (SBZ), Aracaju, Sergipe, Brazil, July, 2014.
16. "Heat stress effects in the dry period on nutrition and metabolism of transition cow and subsequent milk yield", XIX Curso "Novos Enfoques na Produção e Reprodução de Bovinos", Uberlândia, MG, Brazil, March, 2015.
17. "In utero heat stress programs health and productivity of the calf", XIX Curso "Novos Enfoques na Produção e Reprodução de Bovinos", Uberlândia, MG, Brazil, March, 2015.
18. "Heat stress in the dry period - effects on dam and daughter", 5<sup>th</sup> Leite Integral Simpósio Internacional, Curitiba, PR, Brazil, April, 2015
19. "Effects of late gestation heat stress on the physiology of dam and daughter", 66<sup>th</sup> Annual Meeting of the European Federation of Animal Science, Warsaw, Poland. August, 2015.
20. "Strategic use of livestock to improve food security, health and livelihoods", One Health Colloquium, Royal Institute of International Affairs, Chatham House, London, UK. May, 2016.
21. "Programming and epigenetic impacts of late gestation heat stress in dairy cattle" Invited presentation at 13<sup>th</sup> International Workshop on the Biology of Lactation in Farm Animals (BOLFA), Baltimore, MD, USA. July, 2017.
22. "Photoperiod management for dairy cows". XXII Curso "Novos Enfoques na Produção e Reprodução de Bovinos", Uberlândia, MG, Brazil, March, 2018.
23. "Update on dry period heat stress: effects on cow and calf". XXII Curso "Novos Enfoques na Produção e Reprodução de Bovinos", Uberlândia, MG, Brazil, March, 2018.
24. "Effects of late gestation heat stress on the dam" and "Effects of late gestation heat stress on the daughter", 2 keynote presentations to the Annual Meeting of the Australian Association of Ruminant Nutritionists, Melbourne, Australia. October, 2018.
25. "Dry period heat stress: carryover effects on dam and daughter", the 6th International Symposium on Dairy Cow Nutrition and Milk Quality, Beijing, China. May, 2019.
26. "Dry period heat stress: carryover effects on dam and daughter", keynote presentation to the 23<sup>rd</sup> Congress of the Animal Science and Production Association, Sorrento, Italy. June, 2019.
27. "Effects of late gestation heat stress on cow productivity in the next lactation", the 2019 International Cow New Technology Conference, Hohhot, China. August, 2019.
28. "Animal Source Foods: Contributions to Food and Nutritional Security". 9<sup>th</sup> Multi-stakeholder partnership of the Global Agenda for Sustainable Livestock, Manhattan, KS, September, 2019.

29. “Dry period heat stress: carryover effects on dam and daughter”, keynote presentation at the Symposium sur les bovins Laitiers, CRAAQ, Drummondville, QC, Canada. October, 2019.
30. “Dry period heat stress: carryover effects on dam and daughter”, Western Canadian Dairy Conference, Red Deer, Alberta, CN. March, 10, 2020.
31. “Consequences of heat stress during late gestation for the dairy cow and her calf”, Physiology Symposium, American Society of Animal Science Annual Meeting, July 22, 2020.
32. “Enhancing circularity in livestock systems: Research for transition”. American Society of Agricultural and Biological Engineers. July 12, 2021.
33. “Environmental effects on mammary immunity and health”, Lactation Biology Symposium, American Dairy Science Association Annual Meeting Webinar series, October 15, 2021.
34. “Late gestation heat stress: Effect on dam and daughter”, Le Rendez-vous Laitier - AQINAC 2022, Drummondville, Quebec, Canada, March 23, 2022.
35. “Late gestation heat stress: Effects on dam and daughter”, Arborea Cooperative, Osteria, Sardinia, Italy, July 7, 2022.
36. “What have we recently learned about the impact of heat stress in dairy cattle?”. XXV Curso “Novos Enfoques na Produção e Reprodução de Bovinos”, Uberlândia, MG, Brazil, March, 2023.
37. “Utilization of immuno-stimulants during the transition period in cows subjected to heat stress: effects on health, milk production and reproduction”. XXV Curso “Novos Enfoques na Produção e Reprodução de Bovinos”, Uberlândia, MG, Brazil, March, 2023.
38. “Late gestation heat stress programs reduced performance and survival phenotype in dairy cattle”, invited presentation to the 25<sup>th</sup> Congress of the Animal Science and Production Association, Monopoli, Italy. June, 2023.
39. “Identifying opportunities for circularity in dairy and livestock systems”. Circular Bioeconomy Symposium, American Society of Agricultural and Biological Engineers. July, 2023.
40. “Heat stress during late pregnancy: placenta and offspring outcomes”. 1<sup>st</sup> Annual International Domestic DoHAD and epigenetics symposium, Society for the Study of Reproduction Annual Meeting, Dublin, Ireland. July 2024.
41. “In utero heat stress alters calf phenotype: the role of programming”, 75<sup>th</sup> Annual Meeting of the European Federation of Animal Science, Florence, Italy. September, 2024.

#### *National Seminars*

1. “Biology and application of photoperiod management in the dairy herd”, Advanced Nutrition and Management Course, Department of Animal Science, Cornell University, August, 2002.
2. “Electronic ID from birth to slaughter.” Department of Large Animal Clinical Sciences, College of Veterinary Medicine Fall Conference, University of Illinois, October, 2002.
3. “Photoperiod, milking frequency and cow health: Maybe prolactin matters after all”, Department of Animal Science, Michigan State University, June, 2003.
4. “Photoperiod, milking frequency and cow health: Maybe prolactin matters after all”, Department of Animal Science, University of Vermont, November, 2003.
5. “Milking frequency, photoperiod, and bovine lactation: Does prolactin matter?”, Reproductive Biology Training Program, University of Illinois, February, 2004.
6. “Nanotechnological approaches for security and value in food supply systems”. Homeland Security Workshop, Center for Nanoscale Science and Technology, College of Engineering, University of Illinois, May, 2004.
7. “Photoperiodic and dry period length effects on transition dairy cows” and “Increased milking frequency: Considerations for implementation”, Pre-Conference Seminar on Current Topics in Transition Cow Nutrition, Management, and Physiology, American Association of Bovine Practitioners, Salt Lake City, UT. September, 2005.
8. “Approaches for value and security in the food supply”. National Defense University, Urbana, IL. October, 2005.
9. “Vision for animal sciences”. Department of Animal Sciences, University of Florida, June, 2006.
10. “Frequent milking in early lactation.” Department of Large Animal Clinical Sciences, College of Veterinary Medicine Fall Conference, University of Illinois, September, 2006.
11. “Reduced length dry period: Effect on cow health and production.” Department of Large Animal Clinical Sciences, College of Veterinary Medicine Fall Conference, University of Illinois, September, 2006.
12. “Let there be light: Photoperiod management of dairy cattle”. Southeast Dairy Herd Management Conference, Macon, GA. November, 2007.
13. “Biology and application of photoperiod management in the dairy herd”, Minnesota Dairy Health Conference, College of Veterinary Medicine, University of Minnesota, May, 2010.
14. “Evaluation of the impact of heat stress on dry cows and subsequent performance and health”. Minnesota Nutrition Conference, Prior Lake, MN. September, 2013.

15. “Heat stress in late gestation: Programming impacts on dam and daughter”, Department of Animal & Poultry Science and Department of Dairy Science, Virginia Tech, Blacksburg, VA. October, 2013.
16. “Heat stress in late gestation: Programming impacts on dam and daughter”, Department of Animal & Avian Science, University of Maryland, College Park, MD. June, 2014.
17. “Photoperiod Update” and “Impact of Cooling Dry Cows”; presentations at Penn State Dairy Cattle Nutrition Workshop, November, 2015.
18. “Dry period heat stress: effects on immune status in dam and daughter”. Pre-conference presentation at Cornell Nutrition Conference for Feed Manufacturers, October, 2017.
19. “Dry period heat stress: effects on dam and daughter”. Pacific Northwest Animal Nutrition Conference, Boise, ID. January, 2018.
20. “Heat stress in late gestation: Impacts on dam and daughter”, Department of Dairy Science, Virginia Tech, Blacksburg, VA. March, 2019.
21. “Myths and Facts About Animal Source Food Production and the Environment”. Ensuring Children’s Cognitive and Physical Development Through Animal Source Foods; a Symposium of the USAID Livestock Systems Innovation Lab, Washington, D.C., June, 2019.
22. “Dry period heat stress: effects on immune status in dam and daughter” and “Photoperiod Update”. Pre-conference and break-out presentations at Penn State Nutrition Workshop, November, 2019.
23. “Dry period heat stress: effects on dam and daughter”. Northeast Dairy Production Medicine Conference, Syracuse, NY. March 12, 2020.
24. “Environmental factors that impact reproduction in cattle”. Central Plains Dairy Conference, March, 2021.
25. “Baby it’s hot in here: Impacts of late gestation heat stress on dam and daughter”, Division of Animal Sciences, University of Missouri, Columbia, MO. May, 2021.
26. “Animal source foods: importance to development of people and economies”, Keynote Address at the 7<sup>th</sup> Int’l. Food Security Symposium, University of Illinois, Urbana, IL. April, 2023.

#### *International Seminars*

1. “Photoperiodic Effects on Dairy Cattle”. Reproduction Laboratory, INRA, Nouzilly, France. May, 2000.
2. Series of lectures presented to Dairy Health Management Update Mtng., Ontario Veterinary College, University of Guelph, Ontario, Canada, May, 2003.
3. “Management Strategies to Improve Profitability” Series of 4 lectures presented in the inaugural Dairy Herd Management Seminar of Ontario DHIA, December, 2003.
4. “Environmental Management of Dry Dairy Cows: Effects on Production and Health” Faculty of Veterinary Medicine, University of Glasgow, April, 2010.
5. “Preparing, submitting and reviewing manuscripts for international journals”, Workshop sponsored by ADSA, University of Sao Paulo, Piracicabba, SP, Brazil. August, 2014.
6. “Photoperiod Management Strategies” and “Dry Period Heat Stress Effect on Dam and Daughter”; Keynote presentations OMAFRA Ruminant Feed Industry Days, Elora and Ottawa, Ontario, Canada, November, 2015.
7. “Strategic use of livestock to improve food security, health and livelihoods; Examples of research engagement”. University of Rwanda, School of Animal Science & Veterinary Medicine, Nyagatare, December 2016.
8. “The Land Grant University System; Impacts on Agricultural Productivity”. Center of Excellence on Sustainable Agricultural Intensification and Nutrition (CE-SAIN), Royal University of Agriculture, Phnom Penh, Cambodia. August, 2017.
9. “Heat stress in late gestation: Programming impacts on dam and daughter”, INTA, Rafeala, Argentina. December, 2018.
10. “Photoperiodic Effects on Dairy Cattle”, “Heat stress in late gestation: Programming impacts on dam and daughter”, “Preparing, submitting and reviewing manuscripts for international journals”, and “Frequent milking in early lactation”, a series of 4 presentations to the Faculty of Veterinary Medicine, University of Bari – Aldo Moro, Bari, Italy. June and July, 2019.
11. “Late gestation heat stress in dairy cows”, Department of Veterinary Medicine, University of Napoli – Federico II, Naples, Italy. July, 2019.
12. “Late gestation heat stress in dairy cows”, Training Symposium for Lactanet of Canada, Drummondville, QC, Canada. October, 2019.
13. “Late gestation heat stress: Effects on dam and daughter”, International Congress on Animal Reproduction, ICAR 2020+2. Bologna, Italy. July, 2022.
14. “Impacts of late gestation heat stress on dam and daughter”, University of Sassari, Sardinia, Italy. July. 2022.
15. “High impact of high temperature: effects of late gestation heat stress on dam and daughter”, INRAe, Jouy-en-Josas, France. September, 2022.
16. “High impact of high temperature: effects of late gestation heat stress on dam and daughter”, Swedish Agricultural University (SLU), Uppsala, Sweden. June, 2023.

17. “Effects of late gestation heat stress on dam and daughter”, Animal Sciences Seminar Series, University of Paris-Saclay, Jouy-en-Josas, France. March, 2024.

#### *Webinars/Podcasts*

1. “Help your dry cows avoid heat stress”. Hoard’s Dairyman Webinar Series, March 9, 2015. 3rd Place, 2015 Webinar Awards, American Agricultural Editors Association.
2. “Dry period heat stress effect on dam and daughter”. Penn State Dairy Extension “Tech Tuesday” Webinar Series, March 8, 2016.
3. “Economics and biology of dry cow cooling”. Elanco Journal Club Webinar, February 17, 2017.
4. “Dry period heat stress effect on dam and daughter”. Professional Dairy Producers of Wisconsin Webinar series, July 26, 2017.
5. “Dry period heat stress effect on dam and daughter”. Dairy Cattle Reproduction Consortium webinar series, July 12, 2018. Invitation based on reviews of the presentation at annual meeting.
6. “Heat stress affects dry cows and calves”. Hoard’s Dairyman Webinar Series, February 11, 2019.
7. “Photoperiod management of dairy cattle: considerations and applications”. University of Nebraska Dairy Extension Webinar, May 23, 2019.
8. “Dry period heat stress effect on dam and daughter”. “The Nutritionist” webinar series, July 11, 2019.
9. “From herds to households: unpacking the challenges and benefits around animal-source foods”. Co-presented with Dr. Sarah McKune, UF Livestock Systems Innovation Lab. Agrilinks for Livestock Month Webinar Series, November 18, 2019.
10. “Heat stress affects dry cows and calves”. Phibro Animal Health Corp. Seminar series, April 22, 2020.
11. “Dry period heat stress effect on dam and daughter”. Cornell Operations Manager’s Conference, February 11, 2021.
12. “Heat stress affects dry cows and calves”. VES-Artex Seminar series, February 12, 2021.
13. “Heat stress affects dry cows and calves”. D&D Distributing Seminar series, April 8, 2021.
14. “Baby it’s hot in here: Heat stress affects dry cows and calves”. Balchem Seminar series, May 8, 2021; also follow up session with technical services staff.
15. “Heat stress affects dry cows and calves”. Provimi Seminar series, May 13, 2021.
16. “Heat stress abatement in dairy cattle”. Professional Dairy Producers of Wisconsin Seminar series, May 9, 2021.
17. “Herdmates” podcast. June 21, 2021. Hosted by Peter Ballastedt.
18. “Heat stress affects dry cows and calves”. MSD Animal Health-Spain Seminar series, June 30, 2021.
19. “Dry period heat stress effect on dam and daughter”. Southern Brazil Symposium on Dairy Cattle, November 11, 2021.
20. “It’s a hot topic”. Dairy Farmer’s Digest podcast, July 21, 2023.

#### Offices Held in Professional Societies

1. Secretary, Vice-Chair, Chair, Production Division, American Dairy Science Association (2010-13).
2. Overall Program Chair, 2013 Joint Annual Meeting of the American Society of Animal Science and the American Dairy Science Association (2012-13).
3. Production Division Director, Board of Directors, American Dairy Science Association (2011-14; elected).
4. Overall Program Chair, 2015 Joint Annual Meeting of the American Society of Animal Science and the American Dairy Science Association (2014-15).
5. Vice President (2017-18), President (2018-19), and Past-President (2019-20), American Dairy Science Association (elected).
6. President-elect (2019-20), President (2020-21), and Past-President (2021-22), FASS, Inc. (elected). [Previously known as Federation of Animal Science Societies].

#### Editorships of Journals or Other Learned Publications

1. Specialty Chief Editor, *Frontiers in Animal Science*, Physiology & Management Section, 2020-present.
2. Editorial Board, *Journal of Dairy Science*, 2001-06; Physiology and Management Section Editor, 2008-2012; Senior Editor, 2013-2014.
3. Editorial Board, *Journal of Animal Science*, 2003-2007.
4. Editorial Board, *Animal*, 2006-2017.
5. Editorial Board, *Domestic Animal Endocrinology*, 2013-2016.
6. Ad hoc reviewer for the *Journal of Animal Science* and the *Journal of Dairy Science*. Occasional reviewer for *American Journal of Physiology*, *Bioelectromagnetics*, *Biology of Reproduction*, *Endocrinology*, *Journal of Endocrinology*, *Domestic Animal Endocrinology*, *Reproduction*, *Molecular and Cellular Endocrinology*, *PLoS One*, *Animal Science*, and *Comparative Biochemistry and Physiology*.



Grants Received (PI on grants unless indicated otherwise) (Since 2000)

<u>Investigator</u>	<u>Agency and Title</u>	<u>Duration</u>	<u>Total Costs</u>
G.E. Dahl	UIUC Campus Research Board, "Effect of photoperiod on growth hormone receptor mRNA expression in steer calves"	2000-01	\$ 20,000
S.M. Barao (PI), G.E. Dahl, E.E. Connor, (Co-PI's)	Gudelsky Endowment Competitive Grants Program, University of Maryland, "Expression of growth hormone-releasing hormone receptor: Relationship to rapid lean growth in Angus cattle"	2000-02	\$ 40,000
G.E. Dahl, (PI), M. Hutjens, R. Wallace, D. Fischer, G. Schnitkey, (Co-PI's)	Council for Food and Agricultural Research, Sentinel Program (C-FAR) Project #01I-003-SEN "Manipulation of photoperiod to enhance the sustainability of Illinois dairy farms"	2000-03	\$211,089
G.E. Dahl, (PI), D. Morin, J. Salak-Johnson, (Co-PI's)	Council for Food and Agricultural Research, (C-FAR) Project #02I-078-3. "Photoperiodic effect on immune responsiveness in transition dairy cows"	2001-03	\$100,000
G.E. Dahl, (PI) S. Mabjeesh, T. McFadden, A. Shamay, (Co-PI's)	USDA-BARD Award #US-3201-01. "Environmental manipulation during the dry period of ruminants: Strategies to enhance subsequent lactation"	2001-04	\$370,000
G.E. Dahl, (PI), T. McFadden (co-PI)	USDA Higher Education Challenge Grant, Award #2002-038411-12111. "Milk secretion & mastitis: On-line teaching and outreach curriculum development"	2002-04	\$99,999
G.E. Dahl, (PI), T. McFadden (co-PI)	USDA-NRI Award #2002-35206-12839. "Manipulation of prolactin sensitivity in transition dairy cows"	2002-04	\$200,000
J. Salak-Johnson, (PI), G.E. Dahl (co-PI)	National Pork Board Grant NPB #03-111, "Impact of early weaning and photoperiod manipulation on pig welfare"	2003-04	\$47,848
G.E. Dahl	USDA-NRI Award # 2003-35206-13698. "Current issues in growth and development"	2003-04	\$10,000
M. Hutjens (PI), E. Ballard, G.E. Dahl, P. Eberle, T. Funk, P. Goldsmith, K. Griswold, R. Vogen, R. Wallace (Co-PI's)	Council for Food and Agricultural Research, (C-FAR) Project #04-SRI-020. "Illinois First Livestock Focus Initiative".	2003-07	\$385,938
G.E. Dahl, (PI) W. Qualls, R. Hornbaker	Deere & Co. "Food Security Initiative".	2003-04	\$613,990 (\$168,768 to GED)
G.E. Dahl, (PI), A.R. Cobb	"Scrapie Outreach and Education in Illinois". Illinois Dept. of Agriculture.	2004-05	\$18,000
G.E. Dahl	"Premise Identification Education for Livestock Producers". Illinois Dept. of Agriculture.	2004-05	\$19,900
G.E. Dahl	"Novel mastitis treatment for dairy cattle" Pfizer Animal Health.	2005	\$21,762
G.E. Dahl	"Premise Identification Education for Livestock Producers". Illinois Dept. of Agriculture.	2006-07	\$30,850

G.E. Dahl	“Metritis treatment”. Pfizer Animal Health.	2006	\$49,300
G.E. Dahl, C. Risco	“Metritis treatment”. Pfizer Animal Health.	2007	\$37,500
G.E. Dahl	“Mastitis treatment for dairy cattle” Pfizer Animal Health.	2008	\$13,750
G.E. Dahl, C. Risco	“Metritis treatment”. Pfizer Animal Health.	2008	\$45,375
F. Hall (PI), G.E. Dahl, A. DeVries, M. Gunderson	“AGreen circle: Agricultural waste to energy feasibility study” USDA Value Added Grant Program.	2008	\$78,958
P.J. Hansen, G.E. Dahl, A.D. Ealy, J. Cole, J.E.P. Santos, C.R. Staples, A. DeVries, T.R. Bilby, R.J. Collier, J. Fernandez	“Improving fertility during heat stress in lactating dairy cows” USDA-AFRI Integrated Solutions for Animal Agriculture. Award #2010-85122-20623.	2010- 2013	\$1,000,000 (\$121,263 to GED)
G.E. Dahl	“Environmental management effects on transition cow resistance to emerging and invasive pathogens” USDA-NIFA, T-STAR Program. Award #2010-34135-21054.	2010- 2013	\$120,000
G.E. Dahl	“Extended mastitis treatment for dairy cattle” Pfizer Animal Health.	2011- 2012	\$45,643
G.E. Dahl	“Response of mature non-lactating cows to cabergolin under heat stress”. Ceva Sante Animale.	2012- 2013	\$139,492
G.E. Dahl	“Elevated in utero temperature: A suppressor of fetal development and ruminant fitness?” NSF, Award #1247362.	2012- 2014	\$138,386
G.E. Dahl	“Impact of XT-7065 on lactation performance during heat stress”. Pancosama.	2013- 2014	\$38,719
G.E. Dahl, PI S. Tao, S. Wohlgenuth	“Impact of heat stress on cellular events in the mammary gland during the dry period” USDA- NIFA, AFRI Foundational Program. Award #2015-67015-23409.	2015- 2019	\$450,000
G.E. Dahl, PI J. Laporta	“Effect of OmniGen-AF and heat stress on mammary remodeling during the dry period and subsequent productive performance and immune status” Phibro Animal Health.	2015- 2016	\$130,299
A. Adesogan, PI G.E. Dahl, G. Roberts, S. McKune, G. Kiker, J. Hernandez	“Feed the Future Innovation Lab for Livestock Systems”. United States Agency for International Development. Award #AID-OAA-L-15-00003.	2015- 2025	\$49,000,000 (\$600,000 to GED)
J. Laporta, PI, A. Skibiell, F. Peñagaricano, G.E. Dahl.	“Climate change in the dairy industry: Identification of pathways and cellular processes in the mammary gland and evaluation of plausible transgenerational effects of heat stress causing impaired milk production”. UF-IFAS Climate Change Grant Program.	2016- 2017	\$150,000
G.E. Dahl	“Development and expansion of the Brahman herd at the University of Florida”	2017- 2018	\$162,960

Florida Beef Enhancement Fund.			
P.J. Hansen, PI G.E. Dahl, J. Block	“The role of dickkopf-1 to enhance embryonic competence for establishment of pregnancy in cattle”. USDA- NIFA, AFRI Foundational Program. Award #2017-67015-26452.	2017-2020	\$480,000
P.J. Hansen, PI G.E. Dahl, K. Lee, C. Robert	“Sexual dimorphism in developmental programming”. NIH. Award #RO1-HD088352.	2017-2022	\$1,760,549
A. Adesogan, PI G.E. Dahl, A. Havelaar, S. McKune, J. Hernandez	“Feed the Future Innovation Lab for Livestock Systems”. Bill & Melinda Gates Foundation. Award #AID-OAA-L-15-00003.	2017-2022	\$8,700,000 (\$300,000 to GED)
G.E. Dahl, PI D. Vyas, C.D. Nelson	“IESC/USDA – Sri Lanka MOD”. USDA Food for Progress Program. Award #185015.	2018-2024	\$976,228
G.E. Dahl, PI J. Laporta	“Impact of OmniGen feeding during the dry period and early lactation on reproductive performance and health”. Phibro Animal Health. Award #AGR00012380.	2018-2020	\$181,048
M. Binelli, PI, P.J. Hansen, G.E. Dahl	“Development and expansion of the Brahman herd at the University of Florida”. Florida Beef Enhancement Fund.	2018-2019	\$50,000
J. Laporta, PI G.E. Dahl	“Unraveling changes in mammary gland development due to in utero heat stress”. USDA- NIFA, AFRI Foundational Program. Award #2019-67015-29445.	2019-2024	\$499,943
G.E. Dahl, PI, J.J. Bromfield, R.S. Bisinotto	“Assessment of Efficacy of a Bovine Metritis IL-8 Immunomodulator”. Zoetis.	2019-2020	\$243,982
G.E. Dahl	“Effect of OmniGen-AF and heat stress on physiological markers of dry cow immune status”. Phibro Animal Health. Award #AGR00012380 continued.	2020-2024	\$211,452
G.E. Dahl, PI, C.D. Nelson	“Effect of Blue-lite and heat stress on productivity and immune status in lactating cows”. TechMix. Award #AGR00023589.	2021-2024	\$165,728
G.E. Dahl, PI, J.E.P. Santos, N. Dilorenzo	“Potential for manipulating methane intensity in dairy production”. Dairy Management Inc. Award #AGR0002451.	2022-2026	\$835,561
G.E. Dahl	“Système d’Innovation en Production Animale (SIPA)”. US-AID, Associate award to LSIL.	2023-2028	\$3,999,074
G.E. Dahl	“Effect of RPC (rumen protected choline) and heat stress on mammary development in dry cows and methylation patterns in the offspring.” Balchem Corp. Award #AGR00026294.	2023-2025	\$335,073
G.E. Dahl	“Validation of feed efficiency markers in dairy cattle.” GenetiRate 2. Award #AGR00026695.	2023-2025	\$105,166

G.E. Dahl, PI, S. Hendrickx, G. Kiker	“Precision Livestock Farming in Tanzania.” Bill & Melinda Gates Foundation. Award # AGR00029239.	2023-2025	\$2,221,921
I.T. Toledo, PI, G.E. Dahl	“Commercial application of Smart Soakers for reduction of water usage”. Suwanee River Water Management District.	2023-2025	\$216,131
G.E. Dahl, PI, I.T. Toledo	“Comparison of alternative mastitis therapies to spontaneous cure in the commercial setting”. AHV.	2024-2026	\$193,807
J.J. Bromfield, PI, G.E. Dahl, K.C. Jeong, S. Boulant	“Prepartum heat stress increases uterine disease by altering tolerance and resistance mechanisms in dairy cattle”. USDA-NIFA, AFRI Foundational Program. Award #2024-67015-42414.	2024-2028	\$650,000
G.E. Dahl, PI, S. Hendrickx, N. Ludgate, A. Bohn	“AGENew: Advancing Genomic-Enabled Newcastle Disease Resistance in Chickens”. USAID Associate award to LSIL.	2024-2029	\$4,999,795

### Grant and Program Review Panels

1. Panel Member, US-AID Grant Program, Washington, D.C. (1998).
2. Panel Member, USDA Capacity Building Grant Program, Washington, D.C. (1999, 2000, 2002-04, 2006-08).
3. Panel Member, Lalor Foundation Post-doctoral Fellowship Grants, (2002, 2003).
4. Panel Member, INRA-PHASE Evaluation, Nouzilly, France, (2008).
5. Panel Member, Research Competitiveness Program, AAAS (2008).
6. Panel Member, Peer Review of Quality, Department of Life Sciences, University of Limerick, Republic of Ireland, (2010).
7. Panel Member, Research Competitiveness Program, AAAS (2011).
8. Panel Member, USDA-NIFA Review, Department of Dairy Science, Virginia Tech (2012).
9. Panel Member, Academic Review Team of Milk Life Cycle Analysis Report, Dairy Management Inc., Rosemont, IL (2012).
10. Panel Member, PSI-Animal-I, Integrative Organismal Systems (pre-proposals), and Physiological Mechanisms and Biomechanics (invited full proposals), BIO Directorate, National Science Foundation, Arlington, VA (2013).
11. Panel Member, USDA-NIFA Animal Well-Being and Applied Animal Health Review Panel, Washington, D.C. (2014).
12. Panel Member, USDA-NIFA Animal Well-Being and Applied Animal Health Review Panel, Washington, D.C. (2016).
13. Animal Health Research Advisory Council for Dairy, USDA/ARS-National Animal Disease Center, Ames, IA (2023).
14. Panel member, Health, Efficiency & Resource Dynamics (HERD) Research Prioritization Workshop, Dairy Management Inc. and FFAR, Rosemont, IL (2024).

### **Publications and Creative Works**

#### Chapters in Books

1. F.J. Karsch and G.E. Dahl. 1994. Role of the thyroid gland in seasonal reproduction in the ewe. Pp. 594-601 In: Perspectives in Comparative Endocrinology, K.G. Davey, R.E. Peter and S.S. Tobe, eds. National Research Council of Canada, Ottawa.
2. F.J. Karsch, G.E. Dahl, T.M. Hachigian and L.A. Thrun. 1995. Involvement of thyroid hormones in seasonal reproduction. Pp. 409-422 In: Reproduction in Domestic Ruminants III, R.J. Scaramuzzi, C.D. Nancarrow and C. Doberska, eds. J. Repro. Fert. Suppl. 49, Cambridge, England U.K.
3. G.E. Dahl, T.L. Auchtung and P.E. Kendall. 2002. Environmental effects on endocrine and immune function in cattle. Pp. 191-201 In: Use of Large Mammals as Neuroendocrine Models, N.P. Evans, D. Skinner and C. Doberska, eds. Reproduction (formerly J. Reprod. Fert.). Suppl. 59, Cambridge, England U.K.
4. G.E. Dahl, T.L. Auchtung and E.D. Reid. 2004. Manipulating milk production in early lactation through photoperiod changes and milking frequency. Vol. 20(3), Pp. 675-685 In: The Veterinary Clinics of North

- America: Update on Transition Cow Management, N. Cook and K. Nordlund, eds. Elsevier, Philadelphia, PA.
5. G.E. Dahl, B.C. do Amaral, J.W. Bubolz, and S. Tao. 2008. Achievements of research in the field of lactation biology. Pp. 89-94 in World Association of Animal Production, "Animal Production and Animal Science Worldwide - Book of the Year - 2007". A. Rosati, A. Tewolde and C. Mosconi, eds. Wageningen Academic Publishers, Wageningen, The Netherlands.
  6. G.E. Dahl and I.M. Thompson. 2012. Effects of photoperiod in domestic animals. Chapter 13, Pp. 229-242 in "Environmental Physiology of Livestock", R.J. Collier and J.L. Collier, eds. John Wiley & Sons, Inc.
  7. L.L. Hernandez, G.E. Dahl, R.J. Collier. 2017. Regulation of the lactating mammary gland. Pp. 829-840 in "Large Herd Dairy Management", D.K. Beede, ed., Amer. Dairy Sci. Assoc., Champaign, IL.
  8. G.E. Dahl. 2017. Impact of late gestation environment on cow and calf performance. Pp. 591-598 in "Large Herd Dairy Management", D.K. Beede, ed., Amer. Dairy Sci. Assoc., Champaign, IL.
  9. G.E. Dahl. 2018. Impact and mitigation of heat stress for mastitis control. Vol. 34, Pp. 473-478. In: The Veterinary Clinics of North America: Mastitis, P. Ruegg and C. Petersson-Wolfe, eds. Elsevier, Philadelphia, PA.
  10. G.E. Dahl, A.L. Skibieli, and J. Laporta. 2019. In utero heat stress programs reduced health and performance in calves. Vol. 35, Pp. 343-353. In: The Veterinary Clinics of North America: Developmental programming in livestock production, R. Funston and J.T. Mulliniks, eds. Elsevier, Philadelphia, PA.
  11. G.E. Dahl. 2019. Physiology of Lactation in Dairy Cattle – Challenges to Sustainable Production. Chapter 7, Pp. 121-129. In: Animal Agriculture: Sustainability, Challenges and Innovations, eds. F. Bazer, G.C. Lamb and G. Wu. Elsevier, Academic Press, San Diego, CA.

#### Articles in Journals

- # Denotes publication derived from candidate's dissertation.
- \* Denotes publication that has undergone stringent editorial review by peers.
- + Denotes publication that was invited and carries special prestige and recognition.

- #\* 1. Dahl, G.E., L.T. Chapin, S.A. Zinn, W.M. Moseley, T.R. Schwartz and H.A. Tucker. 1990. Sixty-day infusions of somatotropin-releasing factor stimulate milk production in dairy cows. *J. Dairy Sci.* 73:2444-2452.
- \* 2. Tucker, H.A., L.T. Chapin, K.J. Lookingland, K.E. Moore, G.E. Dahl and J.M. Evers. 1991. Temperature effects on serum prolactin concentrations and activity of dopaminergic neurons in the infundibulum/pituitary stalk of calves. *Proc. Soc. Exp. Biol. Med.* 197:74-76.
- #\* 3. Dahl, G.E., L.T. Chapin, M.S. Allen, W.M. Moseley and H.A. Tucker. 1991. Comparison of somatotropin and growth hormone-releasing factor on milk yield, serum hormones and energy status. *J. Dairy Sci.* 74:3421-3428.
- \* 4. Kasa -Vubu, J.Z., G.E. Dahl, N.P. Evans, L.A. Thrun, S.M. Moenter, V. Padmanabhan and F.J. Karsch. 1992. Progesterone blocks the estradiol-induced gonadotropin discharge in the ewe by inhibiting the surge of gonadotropin-releasing hormone. *Endocrinology* 131:208-212.
- #\* 5. Dahl, G.E., L.T. Chapin, W.M. Moseley and H.A. Tucker. 1993. Galactopoietic effects of recombinant somatotropin and growth hormone-releasing factor in dairy cows. *J. Dairy Sci* 76:1550-1557.
- \* 6. Karsch, F.J., G.E. Dahl, N.P. Evans, J.M. Manning, K.P. Mayfield, S.M. Moenter and D.L. Foster. 1993. Seasonal changes in GnRH secretion in the ewe: Alteration in response to the negative feedback action of estradiol. *Biol. Reprod.* 49:1377-1383.
- \* 7. Evans, N.P., G.E. Dahl, B.H. Glover and F.J. Karsch. 1994. Central regulation of pulsatile GnRH secretion by estradiol during the period leading up to the preovulatory surge in the ewe. *Endocrinology* 134:1806-1811.
- \* 8. Dahl, G.E., N.P. Evans, S.M. Moenter and F.J. Karsch. 1994. The thyroid gland is required for reproductive neuroendocrine response to photoperiod in the ewe. *Endocrinology* 135:10-15.
- #\* 9. Dahl, G.E., L.T. Chapin, W.M. Moseley, M. B. Kamdar and H.A. Tucker. 1994. Galactopoietic effects of a (1-30-NH<sub>2</sub>) analog of growth hormone-releasing factor in dairy cows. *J. Dairy Sci.* 77:2518-2525.
- \* 10. Dahl, G.E., N.P. Evans, L.A. Thrun and F.J. Karsch. 1994. A central negative feedback action of thyroid hormones on TRH secretion. *Endocrinology* 135:2392-2397.
- \* 11. Dahl, G.E., N.P. Evans, L.A. Thrun and F.J. Karsch. 1995. Seasonal cycles of thyroxine do not drive seasonal transitions in reproductive neuroendocrine activity in the ewe. *Biol. Reprod.* 52:690-696.
- \* 12. Evans N.P., G.E. Dahl, D. Mauger and F.J. Karsch. 1995. Estradiol induces both qualitative and quantitative changes in the pattern of GnRH secretion during the pre-surge period in the ewe. *Endocrinology* 136:1603-1609.
- \* 13. Goodman, R.L., D.B. Parfitt, N.P. Evans, G.E. Dahl and F.J. Karsch. 1995. Endogenous opioid peptides control the shape and amplitude of gonadotropin-releasing hormone pulses in the ewe. *Endocrinology* 136:2412-2420.

- \* 14. Padmanabhan, V., N.P. Evans, G.E. Dahl, K.L. McFadden, D.T. Mauger and F.J. Karsch. 1995. Evidence for the existence of a short or ultrashort loop negative feedback mechanism in the GnRH neurosecretory system. *Neuroendocrinology* 62:248-258.
- \* 15. Evans, N.P., G.E. Dahl, D.T. Mauger, V. Padmanabhan, L.A. Thrun and F.J. Karsch. 1995. Does estradiol induce the preovulatory gonadotropin-releasing hormone (GnRH) surge in the ewe by inducing a progressive change in the mode of operation of the GnRH neurosecretory system. *Endocrinology* 136:5511-5519.
- \* 16. Herbosa, C.G., G.E. Dahl, N.P. Evans, J. Pelt, R.I. Wood and D.L. Foster. 1996. Sexual differentiation of the surge mode of gonadotrophin secretion: Evidence that prenatal androgens abolish the GnRH surge in the lamb. *J. Neuroendocrinology* 8:627-633.
- \* 17. Evans, N.P., G.E. Dahl, A. Caraty, V. Padmanabhan, L.A. Thrun and F.J. Karsch. 1996. How much of the GnRH surge is required for generation of the LH surge in the ewe? Duration of the endogenous GnRH signal. *Endocrinology* 137:4730-4737.
- \* 18. Thrun, L.A., G.E. Dahl, N.P. Evans and F.J. Karsch. 1996. Time-course of thyroid hormone involvement in the development of anestrus in the ewe. *Biol. Reprod.* 55:833-837.
- \* 19. Normolle, D., N.P. Evans, G.E. Dahl and V. Padmanabhan. 1997. A novel approach to assess changes in circulating endocrine hormones: Analysis of GnRH antagonist suppression of gonadotrophin release in ovariectomized ewes. *Euro. J. Endocrin.* 136:519-530.
- \* 20. Thrun, L.A., G.E. Dahl, N.P. Evans and F.J. Karsch. 1997. Effect of thyroidectomy on maintenance of reproductive suppression in the ewe. *Biol. Reprod.* 56:1035-1040.
- \* 21. Thrun, L.A., G.E. Dahl, N.P. Evans and F.J. Karsch. 1997. A critical period for thyroid hormone action on seasonal changes in reproductive neuroendocrine function in the ewe. *Endocrinology* 138:3402-3409.
- \* 22. Dahl, G.E., T.H. Elsasser, A.V. Capuco, R.A. Erdman and R.R. Peters. 1997. Effects of long daily photoperiod on milk yield and circulating insulin-like growth factor-1 (IGF-1). *J. Dairy Sci.* 80:2784-2789.
- \* 23. Evans, N.P., G.E. Dahl, V. Padmanabhan, L.A. Thrun and F.J. Karsch. 1997. Estradiol requirements for induction and maintenance of the GnRH surge: Implications for neuroendocrine processing of the estradiol signal. *Endocrinology* 138:5408-5414.
- \* 24. Bowen, J., G.E. Dahl, N.P. Evans, L.A. Thrun, Y. Wang, M.B. Brown and F.J. Karsch. 1998. Importance of the GnRH surge for induction of the preovulatory LH surge of the ewe: Dose response relationship and excess in GnRH. *Endocrinology* 139:588-595.
- \* 25. Tripp, M.W., T.A. Hoagland, A. Kimrey, G.E. Dahl and S.A. Zinn. 1998. Concentrations of insulin-like growth factor-1 (IGF-1) and methionine (Met) in cattle supplemented with Met and(or) somatotropin (ST). *J. Anim. Sci.* 76:1197-1203.
- \* 26. Connor, E.E., M.S. Ashwell, S.M. Kappes and G.E. Dahl. 1999. Rapid communication: Mapping of the bovine growth hormone-releasing hormone receptor (GHRH-R) gene to chromosome 4 by linkage analysis using a novel PCR-RFLP. *J. Anim. Sci.* 77:793-794.
- \* 27. Miller, A.R.E., E.P. Stanisiewski, R.A. Erdman, L.W. Douglass and G.E. Dahl. 1999. Effects of long daily photoperiod and bovine somatotropin (Trobect®) on milk yield in cattle. *J. Dairy Sci.* 82:1716-1722.
- \* 28. Connor, E.E., S.M. Barao, L.W. Douglass, S.A. Zinn and G.E. Dahl. 1999. Prediction of bull performance using growth hormone (GH) response to GH-releasing hormone (GHRH). *J. Anim. Sci.* 77:2736-2741.
- \*+ 29. Dahl, G.E., B.A. Buchanan and H.A. Tucker. 2000. Photoperiodic effects on dairy cattle: A review. *J. Dairy Sci.* 83:885-893.
- \* 30. Miller, A.R.E., L.W. Douglass, R.A. Erdman and G.E. Dahl. 2000. Effects of photoperiodic manipulation during the dry period of dairy cows. *J. Dairy Sci.* 83:962-967.
- \* 31. Hunt, A.S., J.H. Soares, Jr., J.C. Byatt and G.E. Dahl. 2000. The effects of exogenous bovine growth hormone and placental lactogen on juvenile striped bass *Morone saxatilis* feed and growth efficiency. *J. World Aqua. Soc.* 31:14-21.
- \* 32. Connor, E.E., S.M. Barao, E. Russek-Cohen and G.E. Dahl. 2000. A two-sample method for assessing growth hormone response to growth hormone-releasing hormone challenge: Use as a predictor of gain in beef bulls. *J. Anim. Sci.* 78:1954-1959.
- \* 33. Dunlap, T.F., R.A. Kohn, G.E. Dahl, M.A. Varner and R.A. Erdman. 2000. The impact of somatotropin, milking frequency, and photoperiod on dairy farm nitrogen flows. *J. Dairy Sci.* 83:968-976.
- \* 34. Connor, E.E., S.M. Barao, A.S. Kimrey, A.B. Parlier, L.W. Douglass and G.E. Dahl. 2000. Predicting growth in Angus bulls: Use of GHRH challenge, insulin-like growth factor I and insulin-like growth factor binding proteins. *J. Anim. Sci.* 78:2913-2918.
- \* 35. Auchtung, T.L., D.A. Buchanan, C.A. Lents, S.M. Barao and G.E. Dahl. 2001. Growth hormone (GH) response to growth hormone-releasing hormone (GHRH) in beef cows divergently selected for milk production. *J. Anim. Sci.* 79:1295-1300.

- \* 36. Auchtung, T.L., E.E. Connor, S.M. Barao, L.W. Douglass and G.E. Dahl. 2001. Use of growth hormone response to growth hormone-releasing hormone (GHRH) to determine growth potential in beef heifers. *J. Anim. Sci.* 79:1566-1572.
- \* 37. Auchtung, T.L., S.M. Barao and G.E. Dahl. 2001. Relation of growth hormone response to growth hormone-releasing hormone, prior to weaning, to post-weaning growth performance in beef calves. *J. Anim. Sci.* 79: 2217-2223.
- \* 38. Auchtung, T.L., D.J. Baer, R.A. Erdman, S.M. Barao and G.E. Dahl. 2002. Relation of growth hormone response to growth hormone-releasing hormone to estimation of milk production via deuterium oxide dilution in beef cattle. *J. Anim. Sci.* 80:1270-1274.
- \* 39. Connor, E.E., M.S. Ashwell and G.E. Dahl. 2002. Characterization and expression of the bovine growth hormone-releasing hormone (GHRH) receptor. *Domest. Anim. Endocrinol.* 22:189-200.
- \* 40. Wang, Y., D.S. Zarlenga, M.J. Paape and G.E. Dahl. 2002. Recombinant bovine soluble CD14 sensitizes the mammary gland to lipopolysaccharide. *Vet. Immunol. Immunopathol.* 86:115-124.
- \* 41. Small, B.C., J.H. Soares, Jr., L.C. Woods III and G.E. Dahl. 2002. Effect of fasting on pituitary growth hormone expression and circulating growth hormone levels in striped bass. *North Amer. J. Aqua.* 64:278-283.
- \* 42. Padmanabhan, V., M.B. Brown, G.E. Dahl, N.P. Evans, F.J. Karsch, D.T. Mauger and J. Van Cleeff. 2003. Neuroendocrine control of FSH secretion: III. Evidence for the existence of a non-GnRH-associated component of episodic FSH secretion in ovariectomized and luteal phase ewes. *Endocrinology* 144:1380-1392.
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10. Dahl, G.E. 2002. Accelerating post-weaning growth in heifers. pp. 11 - 16 in Proceedings of the 4-State Dairy Management Seminar, Midwest Plan Service Publication #MWPS-4SD12.
11. Dahl, G.E. 2002. Photoperiod management of dairy cattle. pp. 27 - 32 in Proceedings of the 4-State Dairy Management Seminar, Midwest Plan Service Publication #MWPS-4SD12.
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14. Dahl, G.E. 2003. Photoperiod management of dairy cattle for production and health. pp. 347 - 354 in Proceedings of the 21<sup>st</sup> Western Canadian Dairy Seminar. J. Kennelly, ed., ISBN 1-896110-19-3.
15. Dahl, G.E. 2003. Milking frequency effects in early lactation. pp. 379 - 384 in Proceedings of the 21<sup>st</sup> Western Canadian Dairy Seminar. J. Kennelly, ed., ISBN 1-896110-19-3.
16. Capuco, A.V., R. Erdman, G. Dahl, M. Meyer and M. Van Amburgh. 2003. Heifer nutrition: Prepubertal growth and development. pp. 102-115 in Proceedings of the 50<sup>th</sup> Maryland Nutrition Conference for Feed Manufacturers and 1<sup>st</sup> Mid-Atlantic Nutrition Conference.
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22. Dahl, G.E. 2010. Photoperiod management of dairy cattle. pp. 15-20. Proceedings of the 2010 Minnesota Dairy Health Conference.
23. Dahl, G.E. 2012. Impact of dry cow cooling on subsequent performance and health. pp. 28-33. Proceedings of the 48<sup>th</sup> Florida Dairy Production Conference.
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29. Dahl, G.E. 2019. Dry period heat stress: effects on dam and daughter. Proceedings of the Annual Conference of the Dairy Calf and Heifer Association, Madison, WI.
30. Dahl, G.E., C.D. Nelson, and J. Laporta. 2020. Managing calf health and performance in utero. Western Canadian Dairy Symposium; Advances in Dairy Technology 32:141-145, Red Deer, Alberta.
31. Laporta, J. and G.E. Dahl. 2022. Short and long-term phenotypic and molecular signatures of fetal hyperthermia. Proc. Southwest Nutr. Conf., Phoenix, AZ.

#### Patents

1. United States Patent #6,610,496, "Prediction of Growth Performance and Composition in Cattle from Response to Growth Hormone-Releasing Hormone". G.E. Dahl, S.M. Barao and E.E. Connor, August 26, 2003, USPTO.

#### Extension Reports

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2. Dahl, G.E., D.H. Lattz and G.D. Schnitkey. Marginal costs versus marginal returns: Why cutting costs is not always the answer. Pg. 45-47 in 2001 Illinois Dairy Report.
3. Buyserie, A., M. Gamroth and G. Dahl. Managing light in dairy barns for increased milk production. 2001. Oregon State University Extension Service.
4. Dahl, G.E. Milking frequency effects in early lactation. Pg. 44-47 in 2002 Illinois Dairy Report.
5. Dahl, G.E. Optimizing ovulation synchronization with pre-synchronization and bST. Pg. 53-54 in 2003 Illinois Dairy Report.
6. Dahl, G.E. Electronic identification and monitoring: Potential for improved health and management. Pg. 55-58 in 2003 Illinois Dairy Report.
7. Dahl, G.E. New ideas in dry and transition management: Beyond nutrition. Pg. 4-10 in 2004 Illinois Dairy Report.

8. Underwood, J.P., J.K. Drackley, T.L. Auchtung and G.E. Dahl. Responses to epinephrine by transition cows fed different amounts of metabolizable protein before calving. Pg. 35-36 in 2004 Illinois Dairy Report.
9. Dahl, G.E. Questions about mandatory animal identification – impact on the dairy industry. Pg. 44-45 in 2004 Illinois Dairy Report.
10. Dahl, G.E. What milking frequency is right for my farm? Pg. 7-11 in 2005 Illinois Dairy Report.
11. Reid, E.D. and G.E. Dahl. National animal identification update. Pg. 19-21 in 2005 Illinois Dairy Report.
12. Dahl, G.E., K.E. Karvetski, J.M. Velasco, and E.D. Reid. Bright ideas in dry cow management. Pg. 54-57 in 2006 Illinois Dairy Report.
13. Reid, E.D. and G.E. Dahl. National animal identification update. Pg. 58-60 in 2006 Illinois Dairy Report.
14. Gressley, T.F., K.E. Karvetski, J.M. Velasco, E.D. Reid, and G.E. Dahl. Reduced freestall availability during the dry period did not impact performance. Pg. 62-64 in 2008 Illinois Dairy Report. Also published as Pg. 5-7 in the Delaware Dairy Newsletter, Fall 2007/08.
15. Dahl, G.E., A.P. Monteiro, I.M. Thompson, and S. Tao. Should we cool dry cows? Pg. 4-11 in the Program and Proceedings of the 2013-2014 Dairy Heat Stress Roadshow.
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17. Ferreira, F.C., G.E. Dahl, and A. De Vries. Economics of cooling dry cows; findings and spreadsheet. EDIS AN342, published March, 2018.
18. Dado-Senn, B., G.E. Dahl, and J. Laporta. How are cows cooled on dairy farms in Florida. EDIS AN355, published April, 2019.
19. Toledo, I.M., G.E. Dahl, R.A. Bucklin and D.K. Beede. Methods to relieve heat stress for Florida dairies. EDIS CIR782, revised February, 2019.
20. Casarotto, L.T., J. Laporta, and G.E. Dahl. Financial impacts of late-gestation heat stress on cow and offspring lifetime performance. EDIS AN374, published December 2021.

#### Popular Press

1. “Adjusting photoperiod may boost milk production”. *Feedstuffs*, 11/10/97. (Reprint of presentation at 1997 Maryland Nutrition Conference).
2. “Controlling barn light makes more milk”. *Hoard’s Dairyman*, 10/10/98.
3. “Light it up”. Interview for Cover Story in *Dairy Herd Management*, 9/00.
4. “Increase lighting to increase milk production and profits”. *Midwest Dairy Business*, 1/01.
5. “Lighting management for dairy cattle”. *Illinois Agri-News*, 1/5/01.
6. “Lights, BST, action”. *Hoard’s Dairyman*, 1/10/01.
7. “Photoperiod management of dairy cattle”. *Feedstuffs*, 6/11/01. (Reprint of presentation at 2001 Western Dairy Management Conference).
8. “Increased milking frequency”. *Illinois Agri-News*, 7/5/02.
9. “Fresh cows and 4X milking: More milk and healthier cows”. *Hoard’s Dairyman*, 7/10/02.
10. “National Food Animal ID Task Force”. *Illinois Agri-News*, 2/29/03.
11. “Dairy Classes On-line”. *Illinois Agri-News*, 8/17/03.
12. “Lichtprogramme richtig planen”. *Elite* (German Dairy Magazine), 1/24/04.
13. “Research evidence mounting in support of greater milking frequency for fresh cows”. *Hoard’s West*, 1/25/04.
14. “Animal Identification for Dairy Producers”. *Illinois Agri-News*, 2/19/04.
15. “National ID system can ensure consumer confidence”. *Illinois Agri-News*, 4/8/05.
16. “Ten questions about lighting and heifers”. *Hoard’s Dairyman*, 9/10/07.
17. “Don’t forget to cool dry cows and heifers”. *Hoard’s Dairyman*, 5/10/12. Republished in *Hoard’s Dairyman en español*, 7/1/12.
18. “Dry cows feel the heat, too”. *Hoard’s Dairyman*, 5/10/14.
19. “Heat stress impacts can last a lifetime”. *Hoard’s Dairyman*, 6/1/14. Republished in *Ex-DairyPress* (Italy), 8/1/14.
20. “Estresse calorico durante o periodo de transição – impactos negativos e como minimizá-los” *Revista Leite Integral*, Especial Período de Transição, 4/1/15.
21. “Cooling Your Dry Cows When it is Hot: Major Paybacks Almost Everywhere in the U.S.” *Dairy Herd Management* (on-line at <http://www.dairyherd.com/>), 4/6/17.
22. “Cooling Dry Cows Benefits Cows, Calves and Cash Flow”. *Hoard’s Dairyman*, 5/10/17.
23. “Update on UF Brahman herd expansion”. *The Florida Cattleman and Livestock Journal*, 9/1/17.
24. “Update on expansion of the UF Brahman herd”. *The Florida Cattleman and Livestock Journal*, 7/1/18.

25. “Heat Stress Lingers for Generations”. Jimena Laporta and Geoffrey Dahl. *Hoard’s Dairyman*, 3/25/19. Republished in *Hoard’s Dairyman en español*, 5/1/19, and in *Ex-DairyPress* (Italy), 6/1/19.
26. “Heat Stress Doesn’t Discriminate”. Geoffrey Dahl, Jimena Laporta and Izabella Toledo. *Hoard’s Dairyman*, 6/25/24.

## **Resident Instruction**

### Summary of Instruction

- “Principles of Animal Science” (ANSC 101), 3 hours (University of Maryland). Required for all Animal Science majors. Principal instructor for the course; two 1 hr. lectures and one 2 hr. laboratory each week (5 laboratory sections). Responsibilities included significant re-structuring of the lecture and laboratory curriculum, delivery of 95% of the lectures, construction and grading of exams and supervision of laboratory teaching assistants.
- “Applied Animal Physiology” (ANSC 212), 3 hours (University of Maryland). Required for all Animal Science majors. Principal instructor and Coordinator for the course; three 1 hr. lectures each week.
- “Applied Animal Physiology Laboratory (ANSC 214), 1 hour (University of Maryland). Required for Animal Science majors in 3 of 4 options. Principal instructor for the course; one 3 hr. laboratory each week (3 sections).
- “Career Options in Animal Science” (ANSC 398A); 1 hour (University of Maryland). Developed course in collaboration with Pat Schoknecht at Rutgers University. Delivered using real-time video presentations to both locations. Coordinated presentations and class assignments.
- “Endocrinology” (ANSC 489I); 2 hours (University of Maryland). Elective for upper-level undergraduates and graduate students (only undergraduate students listed below; approximately the same number of graduate students participated each year). Cross-listed with ANSC 688I (Advanced Endocrinology). Developed and team-taught with Dr. Tom Porter and various guest lecturers. Responsibilities included development and delivery of 29% of lectures, exam construction and grading, general coordination of course.
- “Principles of Dairy Production” (ANSCI 201); 3 hours (University of Illinois). Elective course for Animal Science majors; prerequisite for upper-level Dairy management courses. Revised for Fall 2001 and presented on-line and on-campus in Fall, 2001, 2003 and 2005. Team-taught with Mike Hutjens. Dr. Dahl was responsible for 50% of this course.
- “Milk Secretion, Mastitis and Quality” (taught in 2003 and 2004 as ANSC 492 pending assignment of a permanent course number); 2 hours (University of Illinois). On-line course for UI Dairy Certificate Program; required for certificate. Developed for Spring 2003 and presented on-line in Spring, 2003-2007. Team-taught with Tom McFadden (University of Vermont), Dawn Morin and Dick Wallace. Dr. Dahl coordinated this course and was responsible for 30% of the course content.
- “Advanced Physiology of Lactation of Domestic Animals” (ANS 6702). 1 hour (University of Florida). Developed for Fall, 2010 and presented annually through 2014. Revised in 2021 and offered as 2-hour course to undergraduate (ANS 4701) and graduate students (ANS 6702). Elective course for graduate students in Nursing, Animal Sciences and Animal, Molecular & Cellular Biology Program.

### Supervision of Trainees

#### *M.S. Students*

1. Jennifer Smith - M.S. 1996-1998. Melatonin feeding that simulates a short day photoperiod suppresses circulating insulin-like growth factor-1 in prepubertal heifers. Currently: D.V.M. (University of Florida, Gainesville), VCA Lewis Animal Hospital, Columbia, MD.
2. Allison Miller - M.S. 1996-1999. Incorporation of photoperiod into the management of dairy cattle. Currently: Dairy Specialist, Augusta Cooperative Farm Bureau, Staunton, VA.
3. Tera Auchtung Montgomery - M.S. 1998-2000. Predicting the performance of female beef cattle through the use of physiological attributes. Currently: Professor and Animal Science Program Coordinator, School of Agriculture, University of Wisconsin-Platteville, Platteville, WI.
4. Augustin Rius – M.S. 2002-2004. Long day photoperiod that hastens puberty promotes lean growth in dairy heifers. Currently: Associate Professor, Department of Animal Science, University of Tennessee, Knoxville, TN.
5. Heather Crawford – M.S. 2003-2005. Manipulation of prolactin sensitivity in transition dairy cows. Currently: Research Associate, GEA Farm Technologies, Naperville, IL.
6. Karen Karvetski – M.S. 2004-2006. Photoperiodic manipulation of dairy cattle behavior during the dry period. Currently: D.O., Carilion Clinic, Roanoke, VA.



7. Jessica Velasco – M.S. 2005-2007. Manipulation of photoperiod and stall availability of dairy cattle during the dry period.
8. Jacob Bubolz – M.S. 2008-2010. Environmental and genetic effects on prolactin physiology and immune status of Holstein heifer calves. Currently: Scientist, Zoetis, Kalamazoo, MI.
9. Donald Kazanga – M.S. 2010-2012. The impact of dairy management training of small-scale dairy farmers on milk yield and quality in Malawi. Currently: Senior Manager, Ndatani Investments, Lilongwe, Malawi.
10. Ana Paula Alves Monteiro – M.S. 2011-2013. Impact of maternal heat stress during late gestation on calf performance and health. Currently: Veterinary Practice, Brazil.
11. Thiago Fabris – M.S. 2015-2017. Effect of Omnigen-AF® and heat stress abatement during the dry period on subsequent performance of cows. Currently: Van Beek Nutrition, Kalamazoo, Michigan.
12. Leticia Casarotto Trevisan – M.S. 2019-2020. Effects of immune modulator supplementation on performance of Holstein cows and herd profitability. Co-advised with Jimena Laporta. Currently: Ph.D. student, Department of Animal Sciences, University of Florida, Gainesville, FL.
13. Brittney Davidson – M.S. 2019-2020. Characterizing the physiological and productive responses of heat stress abatement on late-gestation dairy heifers and their offspring. Co-advised with Jimena Laporta. Currently: Ph.D. student, Department of Animal and Dairy Science, University of Wisconsin, Madison, WI.
14. Maria Antonia Torres de Bari – M.S. 2023-present.
15. Hirys Olmo De Godoy – M.S. 2024-present.
16. Landon Prevatt – M.S. 2025-present.

#### *Ph.D. Students*

1. Erin Connor - Ph.D. 1996-1999. Physiological and genetic indicators of growth performance in beef cattle. Currently: Professor & Chair, Department of Animal and Food Sciences, University of Delaware, Newark, DE.
2. Yan Wang – Ph.D. 1996-2000. Role and mechanisms of CD14 mediated response in bovine mastitis. Currently: Research Fellow, NIH, Bethesda, MD. Co-advised with Max Paape, USDA, Beltsville, MD.
3. Tera Auchtung Montgomery – Ph.D. 2000-2003. Photoperiodic effects on immune function in dairy cattle: potential mediation through prolactin and its receptor. Currently: Professor and Animal Science Program Coordinator, School of Agriculture, University of Wisconsin-Platteville, Platteville, WI.
4. Eric Reid – Ph.D. 2003 – 2013. The use of implantable microchips for body temperature collection in cattle. Currently: Director of Nutrition, Cooperative Feed Dealers, Conklin, NY.
5. Sha Tao - Ph.D. 2008 – 2012. The effect of heat stress during the dry period on dairy cattle. Currently: Associate Professor, Department of Animal and Dairy Science, University of Georgia, Athens, GA.
6. Izabella Thompson - Ph.D. 2009 – 2014. Late gestation heat stress effects on cow productive, reproductive and health performance. Currently: Dairy Regional Specialized Agent, University of Florida Extension, Gainesville, FL.
7. Bahroz Ahmed - Ph.D. 2013 – 2017. Elevated in utero temperature: A suppressor of fetal development and ruminant fitness? Currently: Lecturer, University of Sulaimani, Kurdistan, Iraq.
8. Leticia Casarotto Trevisan – Ph.D. 2021-present.
9. Daniel Onan Martinez Cabrera – Ph.D. 2022-present.

#### *Postdoctoral Trainees*

1. Dr. Brian Small - 1998-2000; Currently: Professor and Director, Hagerman Fish Culture Experiment Station, University of Idaho, Hagerman, ID.
2. Dr. Paul Kendall – 2000-2003; Currently: Research Scientist, Ag Research, Ruakura, New Zealand.
3. Dr. Tera Auchtung Montgomery – 2004; Currently: Professor and Animal Science Program Coordinator, School of Agriculture, University of Wisconsin-Platteville, Platteville, WI.
4. Dr. Tanya Gressley – 2005-2007; Currently: Associate Dean of Graduate Programs, College of Agriculture & Natural Resources; Professor, Department of Animal and Food Sciences, University of Delaware, Newark, DE.
5. Dr. Bruno Cesar do Amaral – 2007- 2009; Currently: Progressive Dairy Solutions, Oakdale, CA.
6. Dr. Sha Tao - 2012 – 2014; Currently: Associate Professor, Department of Animal and Dairy Science, University of Georgia, Athens, GA.
7. Dr. Amy L. Skibieli – 2015-2018. Currently: Assistant Professor, Department of Animal Science, University of Idaho, Moscow, ID. Jointly supervised with Dr. Jimena Laporta.
8. Dr. Amelia de Almeida – 2019. Currently: Postdoctoral Research Associate, Australia. Jointly supervised with Dr. Jimena Laporta.

9. Dr. Véronique Ouellet – 2019-2020. Currently: Assistant Professor, Department of Animal Science, Université Laval, Quebec City, QC, Canada. Jointly supervised with Dr. Jimena Laporta.