

Sheryl Barringer Dossier

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EDUCATION

1989 B. S. Food Science, Highest Honors University of Illinois: Urbana, Illinois
1994 Ph. D. Food Science University of Minnesota: St. Paul, Minn

EMPLOYMENT

1994-2000 Assistant Professor: Department of Food Science and Technology, The Ohio State University
2000-2004 Associate Professor: Department of Food Science and Technology, The Ohio State University
2001 Visiting Professor: Department of Process Engineering, University College, Cork, Ireland
2004-present Professor: Department of Food Science and Technology, The Ohio State University
2008 Visiting Scientist: Syft Technologies, Inc. Christchurch, New Zealand
2012-2014 Interim Department Chair: Department of Food Science and Technology, The Ohio State University
2015-present Department Chair: Department of Food Science and Technology, The Ohio State University
2018-2019 Special Administrative Assignment for CFAES P&T process, The Ohio State University
2018-present Interim Faculty Director, Foods for Health Discovery Theme, The Ohio State University

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1. Undergraduate and Graduate Courses Taught since 2000

year	Course Number & Title	Credits	Enrolled	% Taught	Overall Student Evaluation (out of 5)
Wi 00	FST 850.01 Seminar	1	18	100	4.9
Au 00	FST 613 Fruit and Vegetable Processing	4	13	100	4.8
Wi 01	FST 630 Principles of Food Processing	4	17	100	4.1
Au 01	FST 613 Fruit and Vegetable Processing	4	14	100	4.6
Wi 02	FST 630 Principles of Food Processing	4	19	100	4.3
Au 02	FST 613 Fruit and Vegetable Processing	4	18	100	4.2
Sp 03	FST 696 Technical Problem Solving	4	22	100	4.6
Au 03	FST 613 Fruit and Vegetable Processing	4	31	100	4.6
Sp 04	FST 696 Technical Problem Solving	4	38	100	4.5
Au 04	FST 613 Fruit and Vegetable Processing	4	23	100	4.5
Sp 05	FST 696 Technical Problem Solving	4	21	100	3.9
Au 05	FST 613 Fruit and Vegetable Processing	4	19	100	4.7
Sp 06	FST 696 Technical Problem Solving	4	17	100	4.3
Au 06	FST 613 Fruit and Vegetable Processing	4	24	100	4.6
Sp 07	FST 696 Technical Problem Solving	4	30	100	4.7
Sp 07	FST 101 Chocolate Science	2	40	60	4.5
Au 07	FST 613 Fruit and Vegetable Processing	4	28	100	4.4
Au 07	FST 101 Chocolate Science	2	44	50	-
Wi 08	FST 101 Chocolate Science	2	40	50	4.7
Sp 08	FST 696 Technical Problem Solving	4	24	100	4.8
Wi 09	FST 613 Fruit and Vegetable Processing	4	24	100	4.2
Sp 09	FST 696 Technical Problem Solving	4	37	100	4.3
Au 09	FST 613 Fruit and Vegetable Processing	4	21	100	4.4
Sp 10	FST 696 Technical Problem Solving	4	36	100	4.2
Au 10	FST 613 Fruit and Vegetable Processing	4	38	100	4.5
Sp 11	FST 696 Technical Problem Solving	4	61	100	4.3
Au 11	FST 613 Fruit and Vegetable Processing	4	39	100	4.4
Sp 12	FST 696 Technical Problem Solving	4	57	100	4.3
Au 12	FST 5410 Fruit and Vegetable Processing	3	48	100	4.8
Au 13	FST 5410 Fruit and Vegetable Processing	3	42	100	4.8
Au 14	FST 5410 Fruit and Vegetable Processing	3	39	100	4.9
Au 15	FST 5410 Fruit and Vegetable Processing	3	28	100	3.6
Au 16	FST 5410 Fruit and Vegetable Processing	3	37	100	4.3
Au 17	FST 5410 Fruit and Vegetable Processing	3	10	100	

2. Graduate Student Advising

a. Graduate students

Doctoral Students, Completed (dissertation advisor)

Wang S-T. 1996. The freezing behavior of water as influenced by ice cream stabilizers.
(Co-advisor Poul Hansen)

- Bircan C. 2001. Use of the dielectric properties to determine protein denaturation utilizing a frequency sweep at different temperatures
- Sipahioglu O. 2002. Modeling dielectric properties of foods as a function of composition and temperature
- Ratanatriwong P. 2004. Sensory evaluation of electrostatically coated potato chips and powder physical property effects (size and food composition) on electrostatic coating improvement
- Abu-Ali J. 2004. Food coating applications in: electrostatic atomization, non-electrostatic coating and electrostatic powder coating.
- Xu Y. 2009. Efficiency of coating process and real-time volatile release in tomatillo and tomato
- Huang Y. 2010. Adhesion of food powders during coating and the effects of alkalization and roasting conditions on cocoa volatile compounds
- Sumonsiri N. 2012. Effect of powder and target properties on food powder coating and comparison of solid-liquid separation (sls) and vacuum concentration of tomato juice
- Agila A. 2012. Volatile profile of cashews (*anacardium occidentale l.*), honeys, and almonds from different origins by selected ion flow tube mass spectrometry
- Castada H. 2014. A fundamental and applied approach to selected ion flow tube-mass spectrometric study of volatile organic compounds in swiss-type cheeses
- Likitwattanasade T. 2015. The changes of food coating characteristics during coating a powder mixture and salting potato chips nonelectrostatically and electrostatically
- Mirondo R. 2016. Contribution of volatile compounds in flavor and aroma of foods

Masters Students (Thesis), Completed (thesis advisor)

- Li A. 1997. Dielectrics of commonly microwaveable foods and their water-salt relationships.
- Azam ATMS. 1997. Prediction of Bostwick consistency for tomato products using pressure drop along a pipe.
- Bircan C. 1997. Effect of viscosity on dielectric properties in salty and nonsalty food systems.
- Das D. 1997. Factors effecting the peelability of tomatoes and methods to improve chemical peeling of tomatoes.
- Pandrangi S. 1998. Treatment of tomato industry effluent by coagulation using ferric chloride and factors affecting peelability.
- Gunawan MI. 1998. Chlorophyll degradation of processed broccoli during refrigerated storage.
- Apaiiah RK. 2000. Effect of storage and processing temperature on tomato sauce quality
- Miller MJ. 2000. Effect of salt size and shape on non-electrostatic and electrostatic coating of popcorn
- Goodman C. 2000. Flavor, viscosity, and color analyses of hot and cold break tomato juices
- Claybon K. 2001. Consumer acceptability of color and viscosity of processed tomato products by African-American, Latino and prototypical consumers
- Elayedath S. 2001. Electrostatic coating of shredded cheese with antimycotic and anticaking agents.
- Ricks N. 2001. Food powder characteristics important to non-electrostatic and electrostatic coating and dustiness

- Abu-Ali J. 2002. Effect of machine and solution properties on electrostatic coating efficiency.
- Biehl H. 2003. Powder properties important in electrostatic and non-electrostatic coating.
- Reyes C. 2003. Image analysis methods for the analysis of foods.
- Halim F. 2004. The importance of food powder and target characteristics and relative humidity to electrostatic adhesion.
- Rao S. 2004. Effect of calcium addition by liquid dipping & electrostatic powder coating on firmness, drained weight & calcium content of diced tomatoes
- Xu Y. 2005. The cause of molasses gelling
- Sumawi H. 2005. Positive vs. negative electrostatic coating using food powders
- Amefia A. 2005. Improved functionality of food additives with electrostatic coating
- Mayr M. 2005. Corona vs triboelectric charging for electrostatic powder coating
- Bebko M. 2005. Kinetics of potato color and texture development during baking, frying, and microwaving with the addition of liquid smoke
- Johnson D. 2006. The influence of food physical properties on transfer efficiency and adhesion in a tumble drum process
- Cokro Setyo D. 2006. Effect of pH and electrostatic polarity on food powder coating transfer efficiency and adhesion
- Yousuf S. 2006. Modeling nonelectrostatic and electrostatic powder coating
- Antoniewski M. 2007. The effect of a gelatin coating on the shelf life of fresh meats
- Buck V. 2007. Factors dominating adhesion of NaCl onto potato chips
- Gorty A. 2008. Electrohydrodynamic spraying of chocolate
- Somboonvechakarn C. 2009. Effects of particle size and density on separation of mixtures during nonelectrostatic and electrostatic powder coating
- Hansanugrum A. 2010. The Effect of Milk on the Deodorization of Malodorous Breath after Garlic Ingestion
- Azcarate C. 2010. Effect of Enzyme Activity and Frozen Storage on Jalapeño Pepper Volatiles by Selected Ion Flow Tube – Mass Spectrometry
- Ozcan G. 2010. Effect of Enzymes on Strawberry Volatiles During Storage, at Different Ripeness Level, in Different Cultivars and During Eating
- Lin Y-H. 2010. Volatile changes caused by different factors in different types of chocolate
- Bowman, T. 2011. Analysis of factors affecting volatile compound formation in roasted pumpkin seeds with selected ion flow tube mass spectrometry (SIFT-MS)
- Marthina, K. 2011. Confectionery coating using an electrohydrodynamic (EHD) system
- Wampler B. 2011. Volatile generation in bell peppers during frozen storage using selected ion flow tube mass spectrometry (SIFT-MS).
- Ties P. 2012. The influence of lipid content and lipoxygenase on flavor volatiles in the tomato peel and flesh
- Aykas DP. 2012. The Effect of Temperature, Lecithin Content, Voltage, Resistivity, Viscosity, and Surface Tension on Droplets/cm² During Electrostatic Spraying of Oil
- Mosneaguta R. 2012. The effect of chemical preservatives on inhibition of potato browning, volatile organic compounds profile, and microbial inhibition
- Taylor K. 2013. Evaluation of Flavor Variation in Swiss Cheese from Five Factories Using Selected Ion Flow Tube Mass Spectrometry (SIFT-MS), Descriptive Sensory Analysis, and Consumer Testing

- Armstrong M. 2013. Improving Adhesion of Food Powders to Crackers with Hydrocolloid Solutions
- Munch R. 2013. The Effect Of Food And Food Supplements On Volatile Organic Compounds Associated With Malodourous Breath Due To Garlic Consumption
- Smith A. 2014. Evaluation of Peanut Roasting Using Oven and Microwave Technologies on the Development of Color, Flavor, and Lipid Oxidation
- Patana-anake P. 2014. The Effect of pH, Temperature, and Food additives on Tomato Product Volatile Levels
- Akpolat H. 2015. The Effect of pH and Temperature on Cabbage Volatiles during Storage
- Han Y. 2015. Effect of fruit types and temperature on formation of volatiles in the lipoxygenase (LOX) pathway
- Hu X. 2016. Inhibition of Spore Germination and Growth of *Alicyclobacillus acidoterrestris* in Fruit Juices to Prevent the Synthesis of the Flavor-Spoiling Guaiacol
- Ren S. 2016. The effect of chocolate components and tempering on resistivity and viscosity
- Zhang Y. 2016. Analysis of strawberry volatiles in different hydrocolloids and different conditions using Selected Ion Flow Tube – Mass Spectrometry

Masters Students (Non thesis), Completed (advisor)

- Burkhart V. 2006. Sodium acid sulfate in mozzarella manufacturing.
- Black C. 2007. The interrelationship between carrageenan and milk and soy proteins as demonstrated by the physical characteristics of a retorted, shelf-stable pediatric nutritional beverage
- Prawira M. 2007. Effects of ingredients and conching time on preference of milk chocolate
- Hannen J. 2009. The Study of Volatiles in Dark and Milk Chocolate during Conching Using Selected Ion Flow Tube-Mass Spectrometry (SIFT-MS)
- Kelly M. 2012. Lactoferrin: A component of milk that makes an effective greenhouse cutting tool disinfectant
- Ryo S. 2013. Effect Of Storage, Oxygen And Concentration On The Levels Of Key Volatiles In Processed Orange Juice
- Gardner M. 2013. Control of *Propionibacterium freudenreichii* during Ripening of Swiss Cheese

b. Accomplishments of graduate students:

- Wang S-T: 2 peer reviewed papers. Research Scientist at Sweetmate Foods, Inc. Taipei, Taiwan. Now Professor at Leader University in Taiwan.
- Li A: Sr. Software Engineer. OCLC.
- Azam ATMS: 1 peer reviewed paper. Senior Project Officer at Statistics Canada.
- Bircan C: 1 peer reviewed paper. Continued for a Ph.D. in my lab.
- Das D: 2 peer reviewed papers. Assistant Brand Manager at SC Johnson.
- Pandangi S: 2 peer reviewed papers. Currently a post doc in Food Science at Ohio State University.
- Gunawan MI: 1 peer reviewed paper. Product Specialist in Nestle Purina Pet Care.
- Apaiah RK: 2 peer reviewed papers. Currently pursuing a Ph.D. in Holland.
- Miller MJ: 1 peer reviewed paper. Product Developer at Pepsi.
- Goodman C: 2 peer reviewed papers. Beverage Development Scientist at Nestle. Outstanding Research Award recipient.

Elayedath S: 1 peer reviewed paper. Research Scientist, General Mills.

Claybon C: 2 peer reviewed papers. Research Scientist, Slim Fast Company. Outstanding Research Award recipient.

Bircan C: 3 peer reviewed papers. Professor at Adnan Menderes University, Turkey

Ricks N: 1 peer reviewed paper. Research Scientist, General Mills.

Sipahioglu O: 4 peer reviewed papers. Professor at United Arab Emirates University, United Arab Emirates. Outstanding Research Award recipient.

Biehl H: 2 peer reviewed papers. Research Scientist, Wild Flavors. Outstanding Research Award recipient. FAES Young Professional Achievement Award.

Reyes C: 2 peer reviewed papers. Outstanding Research Award recipient.

Halim F: 1 peer reviewed paper. QA/R&D Officer at Pizza Hut.

Ratanatriwong P: 2 peer reviewed papers. 1 book chapter. Lecturer at casta. IFTSA Graduate Paper Competition 3rd place. FAES Young Professional Achievement Award. Assistant Professor at Naresuan University.

Rao S: 2 peer reviewed papers. Food Technologist at ARC- Diversified.

Abu-Ali J: 6 peer reviewed papers. Senior research scientist II at Quaker Oats. Outstanding Research Award recipient. FAES Young Professional Achievement Award. University William Oxley Thompson award for superior career achievement by young alumni.

Xu Y: 1 peer reviewed paper. Continued on for a PhD in my lab.

Sumawi H: 1 peer reviewed paper. Product Development Specialist at Nestle.

Amefia A. 1 peer reviewed paper. Associate Food Scientist, Heinz North America.

Mayr M. 1 peer reviewed paper. Scientist, Nestle. Now with Leprino Foods.

Bebko M. 1 peer reviewed paper. Scientist, Jim Beam. FAES Young Professional Achievement Award.

Johnson D. Instructor in the School of Nursing at Hampton University in Hampton, Virginia.

Cokro Setyo D: 1 peer reviewed paper. Best Overall Presentation for Engineering.

Yousuf S: 1 peer reviewed paper. Research Scientist, Quaker Oats. FAES Young Professional Achievement Award.

Burkhart V. FIC Program Coordinator, The Ohio State University.

Antoniewski M. Muscle Foods Division 2nd place. 2 peer reviewed papers. Research Scientist II, Kraft Foods. FAES Young Professional Achievement Award.

Black C. Senior Scientist, Ross Products Division Abbott Laboratories

Prawira M. 2 peer reviewed papers. Research scientist, PT. Indofood

Buck V. 2 peer reviewed papers. Scientist, Abbott Nutrition. FAES Young Professional Achievement Award.

Gorty A. 1 submitted paper. Scientist, Kerry Food Ingredients.

Somboonvechakarn C. 2 peer reviewed papers. Scientist, DMV International. Outstanding Research Award recipient.

Hannen J. Product developer, Marzetti's.

Xu Y. 4 peer reviewed papers. Food Engineering Division paper competition finalist. Outstanding Research Award. Scientist, Nestles.

Hansanugrum A. 1 peer reviewed paper. Scientist, Agrana.

Azcarate C. 2010. 1 peer reviewed paper. Scientist, Gerbers.

Huang Y. 2010. 3 peer reviewed papers. 2009 Food Engineering Division paper competition finalist. 2010 Second Place Food Chemistry Division paper competition. Scientist, Hersheys.

Ozcan G. 2010. 1 peer reviewed paper. Assistant Professor, Food Engineering Department, Uludag University, Turkey.

Bowman T. 2011. 1 peer reviewed paper. Assistant product development scientist, snacks division, Kelloggs.

Marthina K. 2011. 1 peer reviewed paper. Scientist, Kelloggs.

Wampler B. 2011. 1 peer reviewed paper. Research and Development Scientist, Newly Weds Foods. Scientist, Imbibe.

Ties P. 2012. 1 peer reviewed paper. Research and Development Scientist, Cargill.

Aykas DP. 2012. 2 peer reviewed papers. Continued for PhD at OSU.

Kelly M. 2012. 1 peer reviewed paper. Technician, Plant Pathology OSU.

Sumonsiri N. 2012. 4 peer reviewed papers and 2 book chapters. Outstanding Research Award recipient. Lecturer in the Department of Food Science and Technology at King Mongkut's University of Technology North Bangkok

Mosneaguta R. 2012. 1 peer reviewed paper. QA Engineer at Hearthsides Food Solutions.

Agila A. 2012. 4 peer reviewed papers. Assistant Professor and Head of Department, Tobruk University, Libya

Taylor K. 2013. 2 peer reviewed papers. Third in the Dairy Foods Division competition. Scientist, Mondelez International.

Armstrong M. 2013. 1 peer reviewed paper. Senior sensory technician, Smucker's.

Ryo S. 2013. 1 peer reviewed paper. Scientist, Abbott.

Munch R. 2013. 1 peer reviewed paper. Outstanding teaching assistant. Scientist, Abbott.

Smith, A. 2014. 2 peer reviewed papers. Outstanding teaching assistant. QA Analyst, Boar's Head.

Patana-anake, P. 2014. 2 peer reviewed papers. Scientist, Haagen-Dazs-Thailand

Castada H. 2014. 4 published papers. Outstanding research award. Environmental Scientist, Thomson Environmental Systems.

Akpolat H. 2015. 1 peer reviewed papers. Continued on for a PhD at OSU.

Likitwattanasade T. 2015. Ray Travel Award. 3 peer reviewed papers. Lecturer, Biotechnology, Faculty of Science, Mahidol University, Bangkok, Thailand

Han, Y. 2015. 1 peer reviewed paper. Scientist, Nestle.

Hu, Xiaohuan. 2016. 1 peer reviewed paper. Food Microbiologist, Woeber Mustard, then Sunridge Farm.

Ren, Shuai. 2016. 1 peer reviewed paper. Continued on for a PhD at OSU.

Zhang, Yachen. 2016. 1 peer reviewed paper. Associate Scientist, Abbott.

Mirondo R. 2nd place in OVIFT poster competition. 4 peer reviewed papers. Agro officer, The Ministry of Agriculture, Livestock and fisheries

3. Awards and Formal Recognition for Teaching

2005 Pomerene Teaching Award by the College of Food, Agricultural and Environmental Sciences

2001 Teaching Award by the College of Food, Agricultural and Environmental Sciences: One \$1000 award per year among all department faculty members, currently 17 eligible.

4. Chronological List of Books, Articles, and Other Published Papers

a. Editor

- Crowley JM, S Barringer, K Robinson, Eds. 2004. Proceedings of the ESA Annual meeting 2004. Morgan Hill CA: Laplacian Press. 368p.
- Crowley JM, S Barringer, R Sundararajan, Eds. 2007. Proceedings of the ESA Annual meeting 2007. Cambria CA: Laplacian Press. 272p.

b. Chapters in edited books

- Barringer SA 2003. Ch 6 Canned tomatoes: Production and Storage. In: Hui YH, Ghazala S, Graham DM, Murrell KD, Nip W-K, ed. Handbook of Vegetable Preservation and Processing. New York: Marcel Dekker, Inc. p109-120.
- Barringer SA and P Ratanatriwong. 2003. Rheometers. In: Heldman DR, ed. Encyclopedia of Agricultural, Food and Biological Engineering. New York: Marcel Dekker, Inc. p 862-865.
- Barringer SA 2003. Ch 18 Frozen Tomatoes. In: Hui YH, Ghazala S, Graham DM, Murrell KD, Nip W-K, ed. Handbook of Vegetable Preservation and Processing. New York: Marcel Dekker, Inc. p293-308.
- Barringer SA 2004. Ch 24 Production, Freezing, and Storage of Tomato Sauces and Slices. In: Hui YH, Cornillon P, Legaretta IG, Lim MH, Murrell KD, Nip W-K, ed. Handbook of Frozen Foods. New York: Marcel Dekker, Inc. p415-431.
- Barringer SA 2004. Ch 29 Vegetables: Tomato Processing. In: Smith JS and Hui YH, eds. Food Processing: Principles and Applications. Ames IA: Blackwell Publishing. p473-490.
- Barringer SA 2006. Ch 169 Coating Snack Foods. In: Hui YH, ed. Handbook of Food Science, Technology and Engineering. Vol 4: Food Engineering and food processing. New York: CRC Press. p169-1 – 169-9.
- Rodriguez-Saona L, Barringer SA, McGrady D. 2008. Ch 3 Raw Materials. In: Plimpton S, ed. Total Quality Management Manual. Arlington, VA: Snack Food Association. p49-104.
- Barringer SA, McGrady D. 2008. Ch 4 Processing Operations Affecting Quality. In: Plimpton S, ed. Total Quality Management Manual. Arlington, VA: Snack Food Association. P105-122.
- Barringer SA, McGrady D, Kline D, Stephenson J. 2008. Ch 6 Quality Testing Procedures. In: Plimpton S, ed. Total Quality Management Manual. Arlington, VA: Snack Food Association. p139-212.
- Barringer SA, P Ratanatriwong. 2010. Rheometers. In: Heldman DR, ed. Encyclopedia of Agricultural, Food and Biological Engineering. New York: Marcel Dekker, Inc. 1509-1512.
- Sumonsiri N, Barringer SA. 2011. Ch 5 Food Industry Electrostatic Powder Coating. In: Electrostatics: Theory and Applications. Nova Science Publishers, Inc. Hauppauge NY. 159-170.
- Barringer SA. 2013. Chapter 28: Coating foods with powders. In Handbook of food powders: Processes and properties. B. Bhandari, N. Bansal, M. Zhang, P. Schuck, eds. Woodhead Publishing Ltd 625-639.
- Sumonsiri N, Barringer SA. 2014. Chapter 16: Fruits & Vegetables – Processing technologies and applications. In: Food Processing: Principles and Applications, 2nd edition. Clark S, Jung S, and Lamsal B, eds. Wiley, Hoboken NJ. 363-382.
- Reyes-De-Corcuera JI, Goodrich-Schneider RM, Barringer SA, Landeros-Urbina MA. 2014. Chapter 15: Processing of Fruit & Vegetable Beverages. In: Food Processing: Principles and

Applications, 2nd edition. Clark S, Jung S, and Lamsal B, eds. Wiley, Hoboken NJ. 339-362.

c. Journal articles

1. Barringer SA, Davis EA, Gordon J, Ayappa KG and Davis HT. 1994. Effect of sample size on the microwave heating rate: oil vs. water. *AICHE J* 40: 1433-1439.
2. Barringer SA, Ayappa KG, Davis EA, Davis HT and Gordon J. 1995. Power absorption during microwave heating of emulsions and layered systems. *J Food Sci.* 60(5): 1132-1136.
3. Barringer SA, Davis EA, and Gordon J. 1995. Microwave-heating temperature profiles for thin slabs compared to Maxwell and Lambert law predictions. *J Food Sci* 60(5): 1137-1142.
4. Barringer SA, Fleischmann AM, Davis EA and Gordon J. 1995. The dielectric properties of whey protein as indicators of change in polymer mobility. *Food Hydrocolloid* 9(3): 343-348.
5. Ayappa KG, Davis HT, Barringer SA, and Davis EA 1997. Resonant microwave power absorption in slabs and cylinders. *AIChE J* 43(3): 615-624.
6. Azam ATMS, Barringer SA, Sastry SK and Heskitt B. 1997. Prediction of Bostwick consistency from the viscosity of ketchup and crushed tomato. In Engineering & Food at ICEF 7, R. Jowitt, ed. 84-87.
7. Li A and Barringer SA. 1997. Comparison of the dielectrics of salt solutions and real food systems at pasteurization and sterilization temperatures. In Advances in Food Engineering: Proceedings of the 4th Conference of Food Engineering. G. Narsimhan, M. Okos and S. Lombardo, eds. 27-30.
8. Azam ATMS, Barringer SA, Sastry SK and Heskitt B. 1997. Correlation of Bostwick and pressure drop for tomato products. In Advances in Food Engineering: Proceedings of the 4th Conference of Food Engineering. G. Narsimhan, M. Okos and S. Lombardo, eds. 101-102
9. Datta AK, Barringer SA and Morgan MT. 1997. Effects of composition and temperature on dielectric properties of foods at 2450 and 27 MH. *Proceedings of the Conference of Food Engineering*.
10. Wang ST, Barringer SA and Hansen PMT. 1998. Effects of carboxymethylcellulose and guar gum on ice crystal propagation in a sucrose-lactose solution. *Food Hydrocolloid* 12: 211-215.
11. Wang ST, Hansen PMT and Barringer SA 1998. Effect of sucrose and CMC on D₂O diffusion in water. *Food Hydrocolloid* 12: 115-119.

12. Barringer SA, Azam ATMS, Heskitt B and Sastry S. 1998. On-line prediction of Bostwick consistency from pressure differential for ketchup and related tomato products. *J Food Process Pres* 22(3): 211-220.
13. Bircan C. and Barringer SA. 1998. Effect of viscosity on the dielectric properties of a starch solution when salt is present. *J Food Sci* 63(6): 983-986.
14. Das DJ and Barringer SA. 1999. Use of organic solvents for improving peelability of tomatoes. *J Food Process Pres* 23(4): 193-202.
15. Barringer SA, Bennett MA and Bash WD. 1999. Effect of nitrogen fertilizer levels and fruit maturity on tomato peeling efficiency. *J Veg Crop Prod* 5(1): 3-11.
16. Pandrangi S and Barringer SA. 1999. Effect of applied foliar calcium on ease of peeling of tomato fruit. *J Veg Crop Prod* 5(2): 35-44.
17. Francis DM, Barringer SA and Whitmoyer RE. 2000. Ultrastructural characterization of yellow shoulder disorder in a uniform ripening tomato genotype. *HortScience* 35(6):1114-1117.
18. Pandrangi S and Barringer SA. 2000. Coagulation of tomato lye peeling waste using ferric chloride. *J Food Process Pres* 24(4): 303-314.
19. Gunawan MI and Barringer SA. 2000. Green color degradation of blanched broccoli (*Brassica oleracea*) due to acid and microbial growth. *J Food Process Pres* 25(3): 253-263.
20. Apaiah RK and Barringer SA 2001. Quality loss during tomato paste production versus sauce storage. *J Food Process Pres* 25(4): 237-250.
21. Tijskens LMM, Barringer SA, Biekman ESA. 2001. Modelling [sic] the effect of pH on the colour degradation of blanched broccoli. *Innov Food Sci Emerg Technol* Vol 2, (4) 315-322.
22. Bircan C, Barringer SA and Mangino M. 2001. Use of dielectric properties to detect whey protein denaturation. *J Microwave Power EE* 36(3):179-186.
23. Apaiah RK, Goodman CL and Barringer SA 2001. Quality differences between fresh pack and remanufactured tomato sauce. *J Food Process Pres* 25(6):431-445.
24. Goodman C, Fawcett S and Barringer SA 2002. Flavor, viscosity, and color analyses of hot and cold break tomato juices. *J Food Sci* 67(1): 404-408.
25. Miller MJ and Barringer SA. 2002. Effect of sodium chloride particle size and shape on nonelectrostatic and electrostatic coating of popcorn. *J Food Sci* 67(1): 198-201.
26. Bircan C and Barringer SA. 2002. Determination of protein denaturation of muscle foods using the dielectric properties. *J Food Sci* 67(1): 202-205.

27. Ricks NP, Barringer SA, Fitzpatrick JJ. 2002. Food powder characteristics important to nonelectrostatic and electrostatic coating and dustiness. *J Food Sci* 67(6): 2256-5563.
28. Claybon KT, Barringer SA. 2002. Consumer acceptability of color in processed tomato products by African-American, Latino and Prototypical consumers. *J Food Quality* 25(6): 487-498.
29. Claybon KT, Barringer SA. 2002. Consumer acceptability of viscosity in processed tomato products by African-American, Latino and Prototypical consumers. *J Food Sci* 67(6): 2380-2384.
30. Elayedath S, Barringer SA. 2002. Electrostatic powder coating of shredded cheese with antimycotic and anticaking agents. *Innov Food Sci Emerg Technol* 3(4): 385-390.
31. Bircan C, Barringer SA. 2002. Use of dielectric properties to detect egg protein denaturation. *J Microwave Power EE* 37(2): 89-96.
32. Barringer SA. 2002. Effect of growing conditions, processing and storage on the quality of tomato products. *Foods and Food Ingredients Journal of Japan* 204:30-36.
33. Francis DM, Miller AR, Chen Z, Bongue Bartelsman AM, Barringer SA. 2003. State of the art of genetics and breeding of processing tomato: a comparison of selection based on molecular markers, biochemical pathway, and phenotype for the improvement of fruit color and juice viscosity. In *Proceedings of the Eighth International ISHS Symposium on the Processing Tomato*. Bieche, B., Branthome, X., eds. *Acta Horticulturae* 613: 273-282
34. Sipahioglu O, Barringer SA. 2003. Dielectric properties of vegetables and fruits as a function of temperature, ash and moisture content. *J Food Sci* 68(1): 234-239.
35. Sipahioglu O, Barringer SA, Taub I, Yang APP. 2003. Characterization and modeling of dielectric properties of turkey meat. *J Food Sci* 68(2): 521-527.
36. Sipahioglu O, Barringer SA, I Taub, A Prakash. 2003. Modeling the dielectric properties of ham as a function of temperature and composition. *J Food Sci* 68(3): 904-909.
37. Barringer SA, Sipahioglu O, Bircan C. 2003. The dielectric properties of fruit, vegetables and meat. In: DC Folz, JH Booske, DE Clark, JF Gerling, editors. *Microwave and Radio Frequency Applications Proceedings of the Third World Congress on Microwave and Radio Frequency Applications*. Westerville, OH: American Ceramic Society. pp 57-67.
38. Ratanatriwong P, Barringer SA, J. Delwiche. 2003. Sensory preference, coating evenness, dustiness and transfer efficiency of electrostatically coated potato chips. *J Food Sci* 68(4): 1542-1547.

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57. Ratanatriwong P, SA Barringer, JF Delwiche. 2002. Sensory evaluation of electrostatic versus nonelectrostatic coated potato chips. OARDC Annual Conference.
58. Abu-Ali JM, O Sipahioglu, C Bircan, P Ratanatriwong, SA Barringer. 2002. Development of a nondairy, ready-to-eat and low fat cereal snack which is an excellent source of fiber. IFT Annual Meeting paper 15f-27.
59. Barringer SA, Sipahioglu O. 2002. Modeling the dielectric properties of fruit, vegetables and meat. 3rd World Congress on Microwave and Radio Frequency Applications paper T2C.
60. Ratanatriwong P, SA Barringer. 2003. Sensory preference and process efficiency of electrostatic vs. nonelectrostatic coating of a snack food. Electrostatics 2003 Conference paper P1.
61. Biehl H, SA Barringer. 2003. Powder properties significant to coating efficiency and dustiness in an electrostatic and non-electrostatic tumble drum system. IFT Annual Meeting paper 92B-6.
62. Reyes C, SA Barringer. 2003. A method to measure coating evenness for snacks. IFT Annual Meeting paper 92B-7.
63. Abu-Ali JM, SA Barringer. 2003. General, minimal additive method for electrostatic atomization of food oils, water-soluble additives and emulsions. IFT Annual Meeting paper 72-4.
64. Rao S, SA Barringer. 2003. Liquid dipping versus electrostatic powder coating and application time for calcium chloride on tomato dices. IFT Annual Meeting paper 92B-8.
65. Ratanatriwong P, SA Barringer. 2003. Powder size and composition effects on electrostatic and nonelectrostatic coatings. IFT Annual Meeting paper 92B-9.
66. Sipahioglu O, C Bircan, SA Barringer. 2003. Use of dielectric properties to determine starch gelatinization. IFT Annual Meeting paper 14B-15.
67. Abu-Ali JM, SA Barringer. 2003. Method for electrostatic atomization of emulsions. Electrostatics Society of America Annual Meeting p349-360.

68. Delwiche J, R Liggett, P Ratanatriwong, S Barringer. 2003. Thurstonian Ideal Point Modeling of JAR Scale Ratings. Fifth Pangborn Sensory Science Symposium, Boston, MA. *Symposium Program & Abstract Book*. Abstract No. O39.
69. Ratanatriwong P, SA Barringer. 2004. Powder composition effects on electrostatic and nonelectrostatic coating. International Conference of Engineering and Food 9 No. 876.
70. Abu-Ali JM, SA Barringer. 2004. Generating charged sprays of oil, emulsions and additives using single-stage, high- field electrostatic atomization. International Conference of Engineering and Food 9 No. 252.
71. Xu Y, SA Barringer. 2004. Prevention of molasses gelling. IFT Annual Meeting paper 83E-23.
72. Johnson D, SA Barringer. 2004. Optimization of Electrostatic Powder Coating. IFT Annual Meeting paper 99B-2.
73. Sumawi H, SA Barringer. 2004. Transfer efficiency and dustiness of positive vs. negative polarity electrostatic coating. IFT Annual Meeting paper 99B-1.
74. Sipahioglu O, SA Barringer. 2004. Dielectric properties of date paste and syrup as a function of temperature, ash and moisture content. IFT Annual Meeting paper 17G-5.
75. Halim F, SA Barringer. 2004. Electrostatic adhesion on food products: is it important? Electrostatics society of America Annual meeting. P 361-367.
76. Setyo D, SA Barringer. 2005. Effects of pH of powder on electrostatic coating. OVIFT Annual Meeting.
77. Mayr MB, SA Barringer. 2005. Effect of corona and triboelectric charging on electrostatic powder coating. OVIFT Annual Meeting.
78. Amefia A, SA Barringer. 2005. Improved functionality of food additives with electrostatic coating. OVIFT Annual Meeting.
79. Bebko M, Abu-Ali J, SA Barringer. 2005. Kinetics of potato color and texture development during baking, frying and microwaving with the addition of liquid smoke. OVIFT Annual Meeting.
80. Sumawi H, SA Barringer. 2005. Positive vs. negative corona electrostatic coating of food powders. 10th International Conference on Electrostatics. PFA2.
81. Ratanatriwong P, SA Barringer. 2005. Particle size, cohesiveness and powder composition effects on electrostatic and nonelectrostatic powder coating. IFT Annual Meeting 52-2.

82. Sipahioglu O, C Bircan, SA Barringer. 2005. Dielectric properties of date fruits as affected by ripening and variety. IFT Annual Meeting paper 99C-33.
83. Setyo D, SA Barringer. 2005. The effect of food substrate and protein powders on electrostatic and non-electrostatic coating. IFT Annual Meeting 71C-12.
84. Mayr MB, SA Barringer. 2005. Corona versus tribocharging for electrostatic powder coating. IFT Annual Meeting 71C-5.
85. Amefia A, SA Barringer. 2005. Improved functionality of food additives with electrostatic coating. IFT Annual Meeting 71C-16.
86. Abu-Ali J, SA Barringer, Bebko M. 2005. Kinetics of potato color and texture development during baking, frying and microwaving. IFT Annual Meeting 71D-19.
87. Antoniewski M, S Barringer, L Knipe, H Zerby. 2006. Effect of hydrolyzed gelatin coating on the shelf-life of fresh meats. IFT Annual Meeting 039I-13.
88. Buck V, S Barringer. 2006. Factors dominating adhesion of salt onto potato chips. IFT Annual Meeting 078E-20.
89. Xu Y, S Barringer. 2006. The influence of relative humidity on corona electrostatic coating. IFT Annual Meeting 078E-21.
90. Ratanatriwong P, S Barringer, P. Tanasukarn, S. Suwansri. 2006. Development of seasoned fried banana chip coated by electrostatic powder coating. IFT Annual Meeting 020I-14.
91. Yousuf S, S Barringer. 2006. Modeling nonelectrostatic and electrostatic coating for an aerodynamically fed food coating machine. IFT Annual Meeting 078E-22.
92. Setyo D, SA Barringer. 2006. Effect of pH and polarity on the electrostatic coating of food powders. Electrostatics Society of America Annual Meeting p337.
93. Ratanatriwong P, S. Suwansri, S Barringer. 2007. The effect of particle size and electrostatic coating on flavor enhancement, preference and coating efficiency of seasoning coated snacks. IFT Annual Meeting 185-05.
94. Xu Y, S Barringer. 2007. The effect of relative humidity on food powder properties and corona electrostatic coating in a conveyor belt system. IFT Annual Meeting 008-33.
95. Gorty, A, S Barringer. 2007. Effect of Relative Humidity on Electrostatic and Nonelectrostatic Powder Coating using the tumble drum method. IFT Annual Meeting 008-04.
96. Buck V, S Barringer. 2007. Factors dominating adhesion of salt onto potato chips. IFT Annual Meeting 008-17.

97. Xu Y, S Barringer. 2007. The effect of relative humidity on food powder properties and corona electrostatic coating. Electrostatics society of America Annual Meeting A2 20-29.
98. Somboonvechakarn C, S Barringer. 2008. Factors affecting transfer efficiency and separation of mixtures during nonelectrostatic and electrostatic coating. IFT Annual Meeting 08-A-1479-IFT.
99. Gorty A, S Barringer. 2008. Electrostatic Spraying of Chocolate. IFT Annual Meeting 08-A-1791-IFT.
100. Huang Y, S Barringer. 2008. Adhesion of food powders with nonelectrostatic and electrostatic coating. IFT Annual Meeting 08-A-1526-IFT
101. Bircan C, S Barringer, O Sipahioglu, U Ulken, R Pehlivan. 2009. Levels of aflatoxin in dried figs under conditions of high temperature and drought. IFT Annual Meeting 060-08.
102. Bircan C, S Barringer, U Ulken, R Pehlivan. 2009. Incidence and type of aflatoxin in dried fig, hazelnut, pistachio, peanut and paprika. IFT Annual Meeting 060-46.
103. Hansanugrum A, S Barringer. 2009. Effect of foods on deodorizing the bad breath odor after ingestion of garlic. IFT Annual Meeting 057-61
104. Xu Y, S Barringer. 2009. Real-time analysis of tomato volatile release in the headspace, mouth and nose using selected ion flow tube mass spectrometry. IFT Annual Meeting 057-53.
105. Huang Y, S Barringer. 2009. The destruction and formation of alkylpyrazines and other volatiles in cocoa alkalized before or after roasting. IFT Annual Meeting 057-57.
106. Langford V, C Reed, D Milligan, M McEwan, S Barringer, J Harper. 2009. Headspace analysis of Italian and New Zealand parmesan cheeses using selected ion flow tube mass spectroscopy (SIFT-MS). IFT Annual Meeting 200-09.
107. Gorty A, S Barringer. 2009. Electrohydrodynamic Spraying of Chocolate. Electrostatics Society of America Annual Meeting 10.1.
108. Huang Y, S Barringer. 2010. Real-time Monitoring of Cocoa Volatile Compounds Produced during Roasting. IFT Annual Meeting 188-04
109. Lin Y-H, S Barringer. 2010. The effects of sugar and milk solids on chocolate flavor during conching. IFT Annual Meeting 188-19
110. Azcarate C, S Barringer. 2010. Effect of freezing and blanching on lipoxygenase-derived volatile compound generation in Jalapeño pepper using SIFT-MS. IFT Annual Meeting 070-06

111. Sumonsiri N, S Barringer. 2010. Effect of Powder Properties on Wrap Around Effect in Nonelectrostatic and Electrostatic Coating. IFT Annual Meeting 230-12
112. Ozcan G, S Barringer. 2010. Changes in Strawberry Volatiles in Mouthspace and Nosespace During Eating and Headspace with and Without Enzyme Activity. IFT Annual Meeting 188-01
113. Scotland S, S Barringer, 2010. Enhancing the Aroma of Apple Juice Based on the Effects of Enzymatic Browning on Aroma. IFT Annual Meeting 188-09
114. Marthina K, S Barringer. 2011. Confectionary coating using an electrohydrodynamic system. International Conference on Dielectric Liquids 59.
115. Agila A, S Barringer. 2011. Volatile Profile of Cashews (*Anacardium occidentale L.*) from Different Geographical Origins during Roasting. IFT Annual Meeting 236-29
116. Sumonsiri N, S Barringer. 2011. Effect of NaCl and Target Properties on Nonelectrostatic and Electrostatic Coating. IFT Annual Meeting 290-08
117. Ties P, S Barringer. 2011. The influence of lipid content and lipoxygenase activity on flavor volatiles in different tomato tissues. IFT Annual Meeting 236-18
118. Bowman T, S Barringer. 2011. Volatile compounds formed from pumpkin seeds during roasting. IFT Annual Meeting 236-62
119. Mosneaguta R, S Barringer. 2011. Enzymatic inhibition of Polyphenol oxidase by Sodium acid sulfate, citric acid, and sodium erythorbate. IFT Annual Meeting 236-41
120. Aykas DP, S Barringer. 2011. The effect of conductivity and viscosity on evenness during spraying of oil. IFT Annual Meeting 290-09
121. Marthina K, S Barringer. 2011. Confectionary coating using an electrohydrodynamic system. IFT Annual Meeting 290-21
122. Reed CJ, MJ McEwan, VS Langford, S Barringer. 2011. An Investigation of Chocolate Aroma Using Selected Ion Flow Tube Mass Spectrometry (SIFT-MS). IFT Annual Meeting 236-70
123. Barringer S, K Marthina. 2011. EHD Spraying of “Chocolate” Coating. ESA Annual Meeting F1
124. Aykas DP, S Barringer. 2012. The Effect of Temperature, Lecithin Content, Voltage, Resistivity, Viscosity, and Surface Tension on the Number of Droplets/cm² during Electrostatic Atomization of Soybean Oil. Electrostatic Society of America Annual Meeting

125. Agila A, S Barringer. 2012. Color and Aroma-Related Volatiles Including HMF As Affected by Roasting Conditions in Sweet Almonds (*Prunus dulcis*). IFT Annual Meeting 193-24.
126. Taylor K, M Leidheiser, M Drake, S Barringer, WJ Harper. 2013. Evaluation of Flavor Variation in Swiss Cheese from Five Factories Using SIFT-MS, Descriptive Sensory Analysis, and Consumer Sensory Testing). IFT Annual Meeting
127. Armstrong M, S Barringer. 2013. Improving adhesion of food powders on crackers with hydrocolloid solutions. IFT Annual Meeting
128. Likitwattanasade T, S Barringer 2013. Separation of powder mixtures during nonelectrostatic and electrostatic coating. ESA Annual Meeting. A3
129. Armstrong M, S Barringer. 2013. Improving adhesion of food seasonings on crackers with hydrocolloid solutions. OARDC Annual Research Conference.
130. Likitwattanasade T, S Barringer. 2014. The effect of mixtures on transfer efficiency and dustiness during nonelectrostatic and electrostatic coating. IFT Annual Meeting 024-80
131. Mirondo R, S Barringer. 2014. Assessing the Quality Attributes of Peeled and Unpeeled Tomato Juice using Hot and Cold break Processing and Different Thermal Pasteurization Treatments. IFT Annual Meeting 024-101.
132. Patana-anake P, S Barringer. 2014. Effect of Temperature, pH, and Food Additives on Tomato Product Volatile Levels. IFT Annual Meeting 206-155
133. Likitwattanasade T, S Barringer. 2014. Effect of particle size and composition differences in a mixture during nonelectrostatic and electrostatic coating. ESA Annual Meeting K1.
134. Smith A, S Barringer. 2014. Color, Volatile, and Lipid Oxidation Evaluation of Peanuts Roasted with Oven and Microwave Technologies. OVIFT Annual Symposium.
135. Mirondo R, S Barringer. 2014. Effect of peels on quality attributes of hot and cold break tomato juice and sauce. OVIFT Annual Symposium.
136. Smith A, S Barringer. 2014. Color, Volatile, and Lipid Oxidation Evaluation of Peanuts Roasted with Oven and Microwave Technologies. OARDC Annual Symposium.
137. Mirondo R, S Barringer. 2014. Effect of peels on quality attributes of hot and cold break tomato juice and sauce. OARDC Annual Symposium.
138. Akpolat H, S Barringer. 2014. The effect of temperature and pH on cabbage volatiles during storage. 2014 Syft User's Meeting.

139. Mirondo R, S Barringer. 2014. Effect of Peels on Volatile levels of Hot and Cold Break Tomato Juice and Sauce. 2014 Syft User's Meeting.
140. Park C, S Barringer. 2015. Examining growth patterns of starter cultures in Swiss cheese. CFAES Undergraduate Research Forum.
141. Akpolat H, S Barringer. 2015. The effect of temperature and pH on cabbage volatiles during storage. Hayes Competition
142. Likittwattanasade T, S Barringer. 2015. Effect of Particle Size in Powder Mixtures on Food Coating Characteristics. Hayes Competition.
143. Akpolat H, S Barringer. 2015. The Effect of pH and Temperature on Cabbage Volatiles and Odors During Storage. OARDC Annual Conference.
144. Mirondo R, S Barringer. 2015. Effect of peel on quality attributes of mango puree with different holding times. IFT Annual Meeting.
145. Han Y, S Barringer. 2015. Effect of temperature and time on lipoxygenase (LOX) volatile formation in tomato, bell pepper, tomatillo, strawberry, apple and pear. IFT Annual Meeting.
146. Akpolat H, S Barringer. 2015. The Effect of pH and Temperature on Cabbage Volatiles and Odors During Storage. IFT Annual Meeting.
147. Park C, S Barringer. 2015. Examining growth patterns of starter cultures in Swiss cheese. Denman Undergraduate Research Forum.
148. Han Y, S Barringer. 2015. Effect of fruit types and temperature on formation of volatiles in the lipoxygenase (LOX) pathway. 2015 Syft User's Meeting.
149. Hu X, S Barringer. 2015. Rapid detection of the off-odor guaiacol in juices produced by the spoilage microorganism *Alicyclobacillus acidoterrestris* using SIFT-MS. 2015 Syft User's Meeting.
150. Akpolat H, S Barringer. 2015. The effect of temperature and pH on cabbage volatiles during storage. 2015 Syft User's Meeting.
151. Mirondo R, S Barringer. 2015. Effect of peels on quality attributes of mango puree held at different times. 2015 Syft User's Meeting.
152. Castada HZ, C. Park, W.J. Harper, S. Barringer. 2016. Suppression of propanoic acid, acetic acid and 3-methylbutanoic acid production by other volatiles in a Swiss cheese curd slurry system. 2nd Food Structure and Functionality Forum Symposium – from Molecules to Functionality.

153. Ren S, Barringer SA. 2016. The Effect of Components of Chocolate on Electrostatic Spray Quality. IFT Annual Meeting. 045.
154. Hu X, Huang E, Yousef AE, Barringer SA. 2016. Controlling the production of off-odor guaiacol by *Alicyclobacillus acidoterrestris* in apple juice or a microbiological medium. IFT Annual Meeting.
155. Ren S, Barringer SA. 2016. Effect of chocolate composition on Electrohydrodynamic spraying. 10th Conference of the French Society of Electrostatics.
156. Castada HZ, Z Sun, S. Barringer, X Huang. 2018. Fate and thermal degradation of the natural antioxidant *p*-hydroxybenzoic acid in macadamia nut oil, corn oil, and olive oil. IFT Annual Meeting.
157. Castada HZ, S. Barringer. 2018. Authentication of Single-Origin Green Coffee Beans Using SIFT-MS. IFT Annual Meeting.
158. Castada HZ, K. Taylor, S. Barringer. 2018. Why Do Swiss Cheeses Taste Different? Swiss Cheese Flavor Variability and Correlation Based on Odor Activity Values and Descriptive Sensory Attributes. International Dairy Federation World Dairy Summit.
159. Castada HZ, Liu J, Huang X, SA Barringer. 2019. Natural cyanogenic compounds in food: Rapid detection of toxic hydrogen cyanide in *Macadamia* using Selected Ion Flow Tube-Mass Spectrometry. IFT Annual Meeting.
160. Castada HZ, SA Barringer, Sun Z, Huang X. 2019. Thermal degradation of the natural antioxidant *p*-hydroxybenzoic acid (PHBA) in Macadamia nut oil, olive oil, and corn oil AOCs Annual Meeting.

f. Unpublished scholarly presentations

1. Barringer SA, Davis EA, Gordon J, Ayappa KG and Davis HT. 1992. Microwave heating rate comparison of oil and water. American Institute of Chemical Engineers National Meeting, Minneapolis, MN.
2. Barringer SA, Davis EA, and Gordon J. 1994. The interaction of sample size and dielectric properties in microwave products. MidWest Food Processors Conference, La Crosse WI.
3. Li A and Barringer SA. 1995. Comparison of the dielectrics of salt solutions and real food systems at pasteurization and sterilization temperatures. Conference of Food Engineering. Chicago, IL.
4. Das DJ and Barringer SA. 1995. Factors affecting peelability of tomatoes. MidAmerica Food Processor's Association Annual Meeting, Columbus, OH.

5. Barringer SA 1995. Microwave technology. Food and Dairy Conference, Columbus, OH.
6. Barringer SA 1996. Tomato peeling factors. Ohio Valley Fruit and Vegetable Growers Congress.
7. Barringer SA 1996. Peeling tomatoes for profit. Tomato production, processing and technology workshop. January 16, 1996. 100 attendees.
8. Das DJ and Barringer SA 1997. Factors affecting tomato peeling. Ohio Valley Fruit and Vegetable Growers Congress.
9. Pandrangi S and Barringer SA 1998. Factors affecting tomato peeling. Ohio Valley Fruit and Vegetable Growers Congress.
10. Barringer SA 1999. Factors affecting tomato peeling. Ohio Valley Fruit and Vegetable Growers Congress.
11. Goodman C and Barringer SA 2000. Tomato processing quality studies. Ohio Valley Fruit and Vegetable Growers Congress.

Invited Speaker:

12. Barringer SA. 2000. Dielectric properties through the sterilization temperature range. Institute of Food Technologists Annual meeting, Microwave Sterilization of Foods Symposium.
13. Barringer SA. 2000. Electrostatic powder coating in the food industry: experiments coating cheese, breakfast cereal and popcorn. Electrostatics Society of America Annual Conference.
14. Barringer SA. 2001. Electrostatic coating in the food industry: coating popcorn, cheese and crackers. University College Cork, Ireland.
15. Barringer SA. 2001. Use of the dielectric properties to detect protein denaturation. 8th International Conference on Microwave and High Frequency Heating, Bayreuth, Germany.
16. Barringer SA. 2001. Tomatoes: history, status in the Midwest and processing studies. University of Illinois.
18. Barringer SA. 2004. Electrostatic coating. Coating Science and Technology Conference.
19. Barringer SA. 2006. The lazy professor's guide to grading: how to increase student learning while decreasing professor homework. Price Symposium on Improving Learning.
20. Barringer SA. 2007. What works for me in improving student learning. Kenneth Reisch Forum on Improving Teaching and Learning.

21. Barringer SA. 2007. Xocoatl Quiz from FST 101 Chocolate Science. Steeb Dorm student association.
22. Barringer SA. 2007. Xocoatl Quiz from FST 101 Chocolate Science. Siebert Dorm student association.
23. Barringer SA. 2007. Xocoatl Quiz from FST 101 Chocolate Science. Morrill Tower Dorm student association.
24. Barringer SA. 2008. Xocoatl Quiz from FST 101 Chocolate Science. Baker Hall West student association
25. Barringer SA. 2008. Xocoatl Quiz from FST 101 Chocolate Science. Scott House student association.
26. Barringer SA. 2008. Xocoatl Quiz from FST 101 Chocolate Science. Drackett Tower student association.
27. Barringer SA. 2008. Xocoatl Quiz from FST 101 Chocolate Science. Baker Hall East student association
28. Barringer SA. 2008. Xocoatl Quiz from FST 101 Chocolate Science. Mack Hall student association
29. Barringer SA. 2008. The Chemistry of Chocolate Flavor. University of Canterbury.
30. Barringer SA. 2008. Chocolate Secrets. Radio New Zealand.
31. Barringer SA. 2008. Chocolate Flavor. Christchurch Daily Press.
32. Barringer SA. 2008. Garlic, Tomato and Cocoa Volatiles. Syft Technologies, Inc.
33. Barringer SA. 2009. Examples of Real Time Aroma Measurement Using Syft Technology. Applied Flavor Analysis Symposium at Heinz.
34. Barringer SA. 2009. Value of industry and community interactions. IFT Annual Meeting.
35. Barringer SA. 2009. The Chemistry of Chocolate Flavor. St. Albert's Day at Ohio Dominican University.
36. Barringer SA. 2009. The Chemistry of Chocolate Flavor. Naresuan University, Phitsanulok, Thailand.
37. Barringer SA. 2012. The Chemistry of Chocolate Flavor. American Chemical Society meeting. Columbus OH

38. Barringer SA. 2013. Examples of Real Time Aroma Measurement Using Syft Technology. Syft Symposium. Christchurch New Zealand
39. Barringer SA. 2014. Use of SIFT-MS to measure breath volatile levels after food consumption. European symposium on advances in SIFT-MS. Breda, The Netherlands
40. Barringer SA. 2015. Use of SIFT-MS to measure breath volatile levels. 2015 Syft Users Meeting. Columbus, Ohio.
41. Barringer SA. 2015. Use of SIFT-MS to measure breath volatile levels during and after food consumption. Syft European Users Meeting. London, UK.
42. Barringer SA. 2016. Use of SIFT-MS to measure breath volatile levels during and after food consumption. IX International Congress of Biochemical Engineering. Veracruz, Mexico.
43. Barringer SA. 2016. Trends in the food industry in 2016 and their possible implications for Latin America. IX International Congress of Biochemical Engineering. Veracruz, Mexico.
44. Barringer SA. 2016. Use of SIFT-MS to measure breath volatile levels during and after food consumption. Webinar filmed at Institute of Food Technologists. Chicago, IL.
45. Barringer SA. 2016. Forget Chromatography: Comprehensive, Instant Analysis with SIFT-MS. LCGC Webinar September 15, 2016.
46. Barringer SA. 2017. Food and Flavor Applications of SIFT-MS. 65th ASMS Conference on Mass Spectrometry and Allied Topic. Indianapolis, IN.
47. Barringer SA. 2017. Food and Flavor Applications of SIFT-MS. Institute of Food Technologists. Las Vegas, NV.
48. Barringer SA. 2017. Rapid, Comprehensive Food and Flavor Analysis Using SIFT-MS. American Chemical Society webinar October 11, 2017.
49. Barringer SA. 2018. Rapid, Comprehensive Food and Flavor Analysis Using SIFT-MS. The Analytical Scientist webinar January 17, 2018.
50. Barringer SA. 2018. Rapid, Comprehensive Food and Flavor Analysis Using SIFT-MS. Separation Science webinar March 14, 2018.
51. Barringer SA. 2018. Rapid, Comprehensive Food and Flavor Analysis Using SIFT-MS. LCGC webinar June 13, 2018.
52. Barringer SA. 2018. Strategically investing money to promote excellence in the department. Academic Chairperson's Conference. Orlando FL.

53. Barringer SA. 2019. Use of SIFT-MS to study garlic deodorization and cacao roasting. Pittcon 2019 March 17, 2019.

5. List of editorships or service as a reviewer for journals

Editor, 2015-2017. Foods.

Guest Editor, 2015. Food Coatings, Foods 4(4): 501

Associate Editor, Foods & Food Ingredients Journal of Japan, 2001-present.

Editorial Board of Coatings, 2015-2018

Technical Advisory Committee, International Microwave Power Institute 2005-2008

Editorial Board, Journal of Food Process Engineering 2005-present.

Editor, 1997-2003, Fruit and Vegetable Products Division of Institute of Food Technologists.

Reviewer for the Journal of Food Science, Food Hydrocolloids, Trends in Food Science and Technology, Food Technology, Journal of Agricultural and Food Chemistry, International Journal of Food Science and Technology, Journal of Food Processing and Preservation, Journal of Food Process Engineering, Lebensmittel-Wissenschaft und Technologie, Journal of Food Engineering, Journal of Texture Studies.

6. List of offices held and other service to professional societies

Council of Food Science Administrators Chair Elect 2018, Chair 2019, Past Chair 2020

IFT Fellows and Achievement Awards Juries 2015-2017

Phi Tau Sigma Alternate At-Large Councilor 2014-2017.

10th Conference of the French Society of Electrostatics. Session Chair 2016.

Education, Extension and Outreach Division of IFT. Chair 2014-2015, Chair Elect 2013-2014.

IFT Food Engineering Subpanel Member 2012-2013.

12th International Congress on Engineering and Food (ICEF 12) Executive Committee Member 2011-2015.

Electrostatics Society of America. Vice President 2005-2009, Executive council member 2003-2005, 2009-2017, Technical Program Chair 2004, 2007. Session chair 2001, 2006, 2009, 2011.

Organizer of the Electrostatics Society of America Annual Meeting 2004, 2007.

Food Engineering Division of IFT. Secretary 2007-2008. Vice Chair 2008-2009, Chair 2009-2010. Technical Presentations Subcommittee Representative 2003-2006, Member-at-Large 1998-2001.

Organized the symposia Engineering research priorities: Communication between academia and industry in the food industry in 2007 with Gonul Kaletunc.

Moderator for Driving Instruction With Data: Doing it!.and Driving Instruction With Data at the 2014 annual IFT meeting.

Scientific Program Subcommittee of IFT. Chair 2006-2007.

Member of the Annual Meeting Planning Committee of the Institute of Food Technologists 2006-2007.

Ohio Valley Institute of Food Technologists. Executive committee member 2001-2003, Chair 2000-2001. Chair-elect 1999-2000.

Fruit and Vegetable Products Division of Institute of Food Technologists. Listserv Administrator and Newsletter Editor 1997-2003, Executive Committee Member 1998-01.

North Central Regional Research Project 136/1023; Improvement of Thermal Processes for Foods. Chair 2001-2002, Vice Chair 2000-2001, Secretary 1999-2000.

7. Other professional/public service

Department reviewer, Food Science, Oregon State University 2018

Department reviewer, Food Science, Illinois Institute of Technology 2018

Feeding Tomorrow: Academic Knowledge Base Task Force of IFT, 2017-2018

Higher Education Review Board (HERB) of IFT, 2017 – 2021

Code of Professional Conduct Task Force, IFT 2016

Department reviewer, Food Science, Purdue University 2015

Moderator, Sensory Fundamentals webcast 2014

Department reviewer, Food Science and Nutrition, Iowa State University 2014

Invited reviewer for the Portuguese Foundation for Science and Technology 2006.

Invited reviewer for the National Sciences and Engineering Research Council of Canada 2006.

USDA NRI grant panel 2005, 2006.

Technical Chair, Electrostatics society of America Annual Meeting 2004, 2007.

Invited reviewer for the Strategic Document for Research in Food Powders developed by the European Commission Thematic Program 1: Quality of Life and Management of Living Resources 2002.

Chair, Biological & MEMS Applications session, 2001 National Electrostatics Society meeting

Chair, Food Engineering Division Undergraduate Scholarship committee, 1997

Reviewed project proposals for National Science Foundation grants, 1995, 1997, 1998

IFT Food Engineering division scholarship committee, 1996, 1998

Chair, technical session on Rheology, 1996 National IFT meeting

8. Administrative Service

a. Department Committees

Member:

Outcomes and Assessment committee 2011-2012

Department Advisory committee 2006-2012

P&T committee 2000-2014

Seiberling chair search committee 2010-2012

Semester conversion, 2009-2012

Harris Lectureship committee 2007-2010

Peer review committees for many of the faculty

Search committee for a new Food Engineering faculty position, 2007

Academic Affairs committee 1994-1996, 2006-2012

- Assisted with choosing and assigning new classes to be taught.

Laboratory Instruction and Equipment committee 1994-2006

- Compiled the list of equipment for the experiment station funding competition. Assisted with assignment of students for laboratory instruction.
- Graduate Admissions committee 1994 – 2005
- Assisted in screening and recruiting new students. Developed recruitment brochure.
- Search committee for a new Processing faculty position, 2005
- Fee authorization committee 2002-2005
- Administer the quarterly departmental Outstanding TA awards 1996 – 2004
- Search committee for a new Food Safety faculty position, 2002-2003
- Graduate Written Examinations 1995-2000
- Contributed questions for the exams.
- Public Relations committee 1995-1999
- Developed guidelines for web usage.
- Copying committee 1994
- Developed new faculty, staff and student allowances for copies.
- Homecoming breakfast committee 1994-1995

Chair:

- Seiberling chair search committee 2011-2012
- Teaching Mission-Oriented Planning committee 2011-2012
- Promotion and Tenure committee 2010-2012
- FST Chair search committee 2010-2011
- Harris Lectureship committee 2009-2010
- Graduate Studies Committee 2000-2012
- Instituted an active recruitment program, which has resulted in an increase in both domestic (24 to 27) and total (49 to 69) graduate students in the program.
 - Instituted a system to enforce deadlines for safety training, exams and committee meetings, which has greatly increased compliance.
 - Developed a Ph.D. minor in FST.
 - Revised the course requirements for M.S. students.
 - Revised GRE entrance requirements.
 - Developed a policy for students receiving money from external sources while on a GRA.
 - Developed a graduation checklist, which is distributed to students annually.
 - Oversee all graduate student admissions.
 - Write student nominations for University and College fellowship programs.
 - Propose departmental fellowship awards.
 - Oversee desk assignments, exam deadlines and progress towards degree.
 - Serve as initial advisor for part time students.
 - Guide direction of the graduate program policies.
- Search committee for a department chair, 2005-2006
- Conducted a successful search for a new department chair.
- Search committee for a new Engineering faculty position, 2005
- Search committee for a new faculty position, 1999
- Conducted a successful search for a new carbohydrate chemist.
- Recruitment committee 1996-1998
- Distributed flyers to fraternities, sororities and high school teachers.
- Search committee for a new Food Microbiology faculty position, 1996-97

- Conducted a successful search for a new microbiologist.
- English Proficiency committee 1995-1996
- Developed guidelines for English proficiency among our students.

b. College and University committees

CFAES Research Advisory Committee 2018-present
 First Mondays committee 2016-present
 Plant Pathology Department Chair search committee, Chair 2017-2018
 CFAES Dean search committee 2016
 ACEL Department Chair search committee, Chair 2015-2016
 Hayes Graduate Forum Judge 2016-2017
 Denman Forum Judge 2013-2018
 OARDC abstract and poster judge 2013-2016
 CFAES Promotion and Tenure Committee 2011-2012
 Graduate Enrichment Fellowship Committee 2011-2012
 CFAES University Fellowship committee. 2008-2011
 University Senate Council on Academic Affairs 2006-2008
 Search committee for the new Associate Dean and Director of Academic Affairs in the College of Food, Agricultural, and Environmental Sciences 2006-2007
 OARDC graduate student poster competition judge 2007
 Presidential Scholar Judge 2007
 FAES Committee on Academic Affairs 2004-2005
 University Fellowship Committee 2003-2004
 Food, Agricultural and Environmental Sciences College Honors Committee 2000-2003
 OARDC Seed Grant Proposal Judge 1998, 2001, 2006, 2008

9. Major Academic/Professional Awards and Commendations

OARDC Distinguished Faculty Research Award, 1997
 IFT Samuel Cate Prescott Award: awarded for outstanding ability in research in food science and technology. 2005. Award consists of \$3000 and a plaque.
 Professor of the year award: awarded by the Food Science Club at OSU. 2005-2006.
 Outstanding Volunteer: awarded by the Institute of Food Technologists 2006.
 President's Appreciation Award: awarded by the Electrostatic Society of America 2009.
 Professor of the year award: awarded by the Food Science Club at OSU. 2009-2010.
 Food Engineering Division Outstanding Volunteer 2011
 IFT Food Engineering Division Service Award 2012
 IFT Fellow 2015
 Tanner Award for the most-cited paper of 2014. J Food Sci.: Oven, Microwave and Combination Roasting of Peanuts: Comparison of Inactivation of Salmonella Surrogate Enterococcus faecium, Color, Volatiles, Flavor, and Lipid Oxidation.