CURRICULUM VITAE

MI LI

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EDUCATION

2010–2014	**Ph.D., Wood Science**, *Auburn University*, Auburn, AL. USA
2006–2009	**M.S., Chemical Engineering**, *Northeast Forestry University*, Harbin, China
2000–2004	**B.S., Chemical Engineering**, *Northeast Forestry University*, Harbin, China

PROFESSIONAL APPOINTMENTS

2020–present	**Assistant Professor**, *The University of Tennessee*, Knoxville, TN. USA
2015–2019	**Post-Doctoral Fellow**, *Oak Ridge National Laboratory*, Oak Ridge, TN. USA U.S. DOE BioEnergy Science Center (BESC)
2010–2014	**Graduate Research Assistant**, *Auburn University*, Auburn, AL. USA
2004–2010	**Administrator/Lecturer**, *Northeast Forestry University*, Harbin, China

RESEARCH AREAS

- Green biorefinery and fractionation of chemicals and materials from lignocellulosic biomass
- Functionalize and engineer cellulose/lignin-based smart and sustainable materials
- Design and synthesis biogenic, biodegradable, and upcyclable circular (co-)polymers

RECEIVED GRANTS (my allocated portion in the parentheses)

----------*Selected External Grants*----------

- 01/2025–12/2025: **M Li**. Engineer corn stalk-derived sustainable adsorbents for dye removal. *TCPB*, **PI**, $15,000 ($15,000)
- 03/2024–02/2025: AJ Ragauskas, **M Li**, W Wang. Design Lignin-based and Fluorocarbon-free Omniphobic Textile Coatings, *US DoD SERDP-ESTCP*, WP24-4079, **co-PI**, $250,000 ($80,000)
- 01/2024–12/2025: **M Li**. Cellulose-Metal Organic Frameworks Hybrid Adsorbent for PFAS Removal from Water, *US EPA 20th P3 Award*, SU84087101, **PI**, $75,000 ($75,000)
- 01/2024–12/2024: **M Li**. Develop Sustainable Sorbents from Corn Residue for Pollutant Removal. *TCPB*, **PI**, $30,000 ($30,000)
- 07/2024–06/2027: H Zhou, A. Desjarlais, **M Li**, C Cronley, S Shrestha, A Brooks. Cost-Compression Solution for Continuous Insulation Retrofit Via Spray-On Monolithic Insulated Cladding (MonoClad), *DOE EERE BENEFIT*, **co-PI**, $1,875,000 ($437,000)
- 06/2021–06/2022: **M Li**. Synthesize and Develop Smart Materials Using Nanocellulose, *ORAU Ralph E. Powe Junior Faculty Enhancement Grant*, **PI**, $10,000 ($10,000)

- 02/2021–08/2024: AJ Ragauskas, C Cai, **M Li**. Lignin-based Polyester Vitrimers. *USDA Sun Grant SER*, **co-PI**, $342,230 ($5,000)
- 02/2021–08/2024: Z-Y Cheng, **M Li**, T Elder, Z Jiang. Development of Crystalline Nanocellulose (CNC) Based Flexible Piezoelectric Materials for Energy Harvest. *USDA Sun Grant SER*, **co-PI**, $342,000 ($100,000)
- 01/2021–12/2022: **M Li**, Niki Labbe. Conversion of Glucose to Glucaric Acid Employing Efficient and Recyclable Catalysts. *TCPB*, **PI**, $60,000 ($55,000)
- 01/2020–12/2020: **M Li**. Integrated Production of Value-added Chemicals from Corn. *TCPB*, **PI**, $20,000 ($20,000)

----------*Selected Internal Grants*----------

- 01/2024–05/2024: Bio-derived adsorbent for pollutants removal. *Faculty Research Assistants Funding (FRAF) Award*. PI, $1,750 ($1,750)
- 09/2023–05/2024: Multiple states collaboration on cellulose-derived functional and sensing materials. *Southeastern Conference (SEC) Visiting Faculty Travel Grant Program*. PI, $1,410 ($1,410)
- 09/2022–06/2023: 3D Printing of Fully Renewable and Biodegradable Vitrimers and Its Recycling. *Faculty Research Assistants Funding (FRAF) Award*, PI, $4,948 ($4,948)
- 08/2022–07/2023: Design and Engineering of Cellulose-Metal Organic Frameworks (Cello-MOF) for Catalytic Conversions. *University of Memphis and University of Tennessee Institute of Agriculture Collaborative Research Network (CORNET) Grant*, PI, $50,000 ($25,000)
- 01/2022–12/2023: Design Bioderived Furanic Circular Polymers for Next-Generation. *UT CRC*, PI, $113,397 ($113,397)
- 01/2021–12/2021: Conversion of Glucose to Glucaric Acid Employing Heterogeneous Nitroxyl Radical Catalysts. *UT AURA*, PI, $2,300 ($2,300)
- 05/2020–07/2020: One-pot biphasic biomass fractionation. *UT AURA*, PI, $2,300 ($2,300)

TEACHING EXPERIENCE

Spring 2025	ME 496/558 (invited lecture), *Nature-Inspired Surfaces* Mixed level, Dept. of Mechanical, Aerospace and Biomedical Engineer., UTK
Spring 2024	FWF 603*, Research Planning* Graduate level, School of Natural Resources, UTK
Spring 2023	FDSC-618 (invited lecture)*, Structures and Functionalities of Polysaccharides* Graduate level, Dept. of Food Science, UTK
Spring 2022	FORS 593 (co-teaching)*, Natural Fibers and Application* Graduate level, Dept. of Forestry, Wildlife and Fisheries, UTK
Spring 2021	FDSC-618 (invited lecture)*, Structures and Functionalities of Polysaccharides* Graduate level, Dept. of Food Science, UTK
Spring 2017	CBE 691 (co-teaching), *Biorenewable Polymer* Graduate level, Dept. of Biomolecular and Chemical Engineering, UTK
2007–2010	*Chemistry of Natural Fibers*, Undergrad level, Dept. of Bio-derived Materials Science and Engineering, Northeast Forestry University
2007–2010	*English of Biomaterials and Bioproducts*, Undergrad level, Dept. of Bio-derived Materials Science and Engineering, Northeast Forestry University

AWARDS/HONORS

11/2024 1 of the 3 finalists for the 2024 FBP Young Professional Award, AIChE
01/2024 *20th P3 Award*, Team Research, US EPA
11/2023 Nominee for Gamma Sigma Delta Research Award 2023, UTIA Section
10/2023 SEC Faculty Travel Program Award 2023-2024, Southeastern Conference
11/2022 Student/Faculty Research Award 2022-2023 and 2023-2024, UT
06/2022 Nominee for T. J. Whatley Distinguished Young Scientist Award 2022, UTIA
06/2021 Ralph E. Powe Junior Faculty Enhancement Award 2021–2022, ORAU
09/2017 Research Distinguished Achievement Award, Biosciences Division, ORNL
07/2017 Research highlighted online by Biological and Environmental Research of US DOE
12/2014 Research featured in the cover page of Auburn University Graduate School Magazine
03/2014 Outstanding International Graduate Student Award, Auburn University
02/2014 Drummond Award for outstanding Ph.D., School of Forestry & Wildlife Science
02/2014 Meriwether Award of School of Forestry and Wildlife Science, Auburn University
11/2013 Outstanding Three Minute Thesis Presentation (rank 5th/52), Auburn University
03/2013 Outstanding Oral Presentation, Graduate Scholars Forum, Auburn University
07/2008 Distinguished Paper Award, China Society of Forestry, China
04/2004 Outstanding Undergraduate Award, Northeast Forestry University, China

PUBLICATIONS (*corresponding author; †supervised; IF- accessible IF by the time at acceptance)

1. R Jiang, B Bian, R Li, D Zhang, C Lai *, **M Li***, Q Yong. (**2025**) A Green Strategy for Co-production of Xylooligosaccharides and Fermentable Sugars from Birch via Tween-assisted Tartaric Acid Pretreatment. Submitted to *Green Chemistry*. (ms ID:)

2. R Santo, **M Li**, Y Zheng*, W Wu*. (**2025**) Aqueously upcycled lignin with emergent tribonegativity for skin-integrated triboelectronics. Submitted to Advanced Materials. (manuscript ID: adma.202518412)

3. R Li, Z Zhang, X Wang, X Zhao, H Xu, **M Li**, C Huang*. **(2025)** Revealing the mechanism of phenoxyethanol-acid pretreatment for removing lignin from bamboo: kinetic analysis and simulation analysis. Submitted to *Green Chemistry*. (manuscript ID: GC-ART-10-2024-005021.R1)

----------*Accepted & Published Manuscript*----------

1. S Saedi, Z Zhou, **M Li**, S. Wang*. (**2025**) Preparation of PFAS-free Oil-resistant Paper Using a Lignin-based Resin. *Food Packaging and Shelf Life*, 52, 101640. doi: 10.1016/j.fpsl.2025.101640 (2024 **IF 10.6**)

2. H Peng, **M Li**, K Wang, K Sahoo, D Jeong, L Jia, S Pandey, EJ Oh, J Dong, J Lee, J Qi, NArabi, S Babaei, S Arvelli, S-T Yang, M Zhang, J Zhao*. (**2025**) Production of Ethanol, Butanol, Itaconic Acid, 3-Hydroxypropionic Acid, Polyhydroxyalkanoates, and Lignin from Lignocellulosic Biomass. *Green Chemistry*. doi: 10.1039/D5GC04325E (2024 **IF 9.2**)

3. Z Luan, X Wang, W Zhang, X Shi, R Li, C Lai*, D Zhang*, **M Li***, Q Yong. (**2025**) Reversing lignin inhibition on enzymatic hydrolysis through regulating supramolecular assembly. *Bioresource Technology*, 428, 132451. doi: 10.1016/j.biortech.2025.132451 (2024 **IF 11.5**)

4. M Zhang, L Jia, **M Li**, H Peng, Y Tan, S Arvelli, Y Huang, A Cunha-Neves, EJ Oh, J Zhao*. **(2024)** One-Pot Biomass Pretreatment for Ethanol Production by Engineered Saccharomyces cerevisiae. *ACS Sustainable Chemistry & Engineering*, **13**, 14, 5201–09. doi: 10.1021/acssuschemeng.4c10101 (2023 **IF 7.1**)

5. M Feng, W Dong, Z Wei, Q Wu, R Qiu, T Gao, Y Guo, Z Li, **M Li**, Y Chen*. (**2025**) Effects of Straw Return on Mitigating Cadmium-contaminated Soils. *Soil Use and Management*, **41**, 2: e70085. doi: 10.1111/sum.70085 (2023 **IF 5.0**)

6. Y Zhang, Z Ye, W Liao, Q Wu, Z Wei, R Qiu, T Gao, W Xian, K Zhang, **M Li**, Y Chen*. (**2025**) Cellulose nanocrystals for green remediation of contaminated soil with multiple heavy metals. *Environmental Geochemistry and Health*, **47**, 133. doi: 10.1007/s10653-025-02450-8 (2023 **IF 3.2**)

7. Z Luan, W Zhang, X Shi, R Li, C Lai*, D Zhang*, **M Li***, Q Yong. **(2025)** Reversing Lignin Inhibition on Enzymatic Hydrolysis through Regulating Supramolecular Assembly. *Bioresources Technology*, 428, 132451. doi: 10.1016/j.biortech.2025.132451 (2023 **IF 9.7**)

8. M Alipanahrostami, T Mccoy, **M Li**, W Wang*. (**2025**) Surfactant-Mediated Mobile Droplets on Smooth Hydrophilic Surfaces. *Droplet*, 4, 2, e70004. doi: 10.1002/dro2.70004

9. M Zhang, L Jia, **M Li**, CG Yoo, H Peng, S Arvelli, J Zhao. (**2025**) Challenges and Perspectives in Lignin-derived Polyurethane Foam Synthesis. *Advanced Sustainable Systems*, 9, 5, 2401054. doi: 10.1002/adsu.202401054 (2023 **IF 6.5**)

10. R Li, Z Zhang, X Wang, X Zhao, H Xu, **M Li**, C Huang. (**2024**) Revealing the mechanism of phenoxyethanol-acid pretreatment for removing lignin from bamboo: kinetic analysis and simulation analysis. *Green Chemistry*, 27, 11, 3044–63. doi: 10.1039/D4GC05021E (2023 **IF 9.3**)

11. H Yu, G Zhang, J Liu, P Liu, H Peng, Z Teng, Y Li, X Ren, C Fu, J Tang, **M Li**, Y Wang, L Wang*, L Peng*. (**2025**) A functional cascading of lignin modification via repression of caffeic acid O-methyltransferase for bioproduction and anti-oxidation in rice. *Journal of Advanced Research*, doi: 10.1016/j.jare.2025.01.048 (2023 **IF 11.4**)

12. K Zhang, MD Smith, **M Li***. (**2024**) Molecular insights into the in situ early-stage assembly of metal-organic frameworks on cellulose nanofibrils. *Journal of Materials Chemistry A*, 12, 33277–33289. doi: 10.1039/D4TA05512H (2023 **IF 10.7**)

13. Z Zhou, K Rajan, S Saedi, N Labbé, **M Li**, W Wang, S Wang*. (**2024**) A fully plant-based water- and oil-resistant paper composite. *ACS Sustainable Chemistry & Engineering*, 12, 50, 18043–18057. doi: 10.1021/acssuschemeng.4c06079 (2023 **IF 7.9**)

14. K Zhang, LH William, ND Evans, T. Elder, CM Garner, **M Li***. **(2024)** *In situ* Synthesis of metal-organic frameworks on sulfonated cellulose nanofibrils. *Solid State Sciences*, 158, 107755. doi: 10.1016/j.solidstatesciences.2024.107755 (2023 **IF 3.4**)

15. Y Nan, D Maldonado, K Zhang, H Du, D Whitehead, **M Li**; X Zhang, MS Peresin*. **(2024)** Polyethylenimine functionalized graphene oxide and cellulose nanofibril composite hydrogels:

Synthesis, characterization and water pollutants adsorption. *Carbohydrate Polymer Technologies and Applications*, 8, 100585. doi: 10.1016/j.carpta.2024.100585 (2023 **IF 6.2**)

16. D Gomez-Maldonado, BR Dickson, G Au, MJ Bortner, **M Li**, E Espinosa, A Rodriguez, B Higgins, MS Peresin*. **(2024)** Exploring the effects of cellulose sources on silver reduction and the bacterial removal of nanocellulose-based hydrogel beads. *Carbohydrate Polymer*, 347, 122771. doi: 10.1016/j.carbpol.2024.122771 (2023 **IF 6.2**)

17. K Zhang, T Elder, Z-Y Cheng, K Zhan, Y Peng, **M Li***. (**2024**) Cellulose nanofiber-templated metal-organic frameworks for fluorescent detection of methyl parathion pesticides. *Journal of Environmental Chemical Engineering*, 12, 112670. doi: 10.1016/j.jece.2024.112670 (2022 **IF 7.7**)

18. D Xie, Y Pu, N Bryant, DP Harper, W Wang, AJ Ragauskas, **M Li***. (**2024**) Synthesis of bio-based repairable polyimines with tailored properties by lignin fractionation. *ACS Sustainable Chemistry & Engineering*, 12, 17, 6606–6618 doi: 10.1021/acssuschemeng.3c08482 (2022 **IF 8.4**)

19. W Yang, J Li*, Z Yao, **M Li**. (**2024**) A review on the alternatives to antibiotics and the treatment of antibiotic pollution: Current development and future prospects. *Science of The Total Environment*, 926, 171757. doi: 10.1016/j.scitotenv.2024.171757 (2022 **IF 9.8**)

20. BB Asare-Bediako, **M Li**, N Labbé, N Abdoulmoumine*. **(2024)** Ceria-ionic liquid modified catalyst for dimethyl carbonate synthesis from CO_2 and methanol. *ChemSusChem*. doi: 10.1002/cssc.202301805 (2022 **IF 8.4**)

21. D Xie, Z Liu, Y Cao, SI Yang, C Su, **M Li***. (**2024**) Improving antioxidant activities of water-soluble lignin-carbohydrate complex isolated from wheat stalk through prolonging ball-milling pretreatment and homogeneous extraction. *Journal of Bioresources and Bioproducts*, 9, 1, 113-125. doi: 10.1016/j.jobab.2023.11.002 (2022 **IF n/a**)

22. K Zhang, I Sutton, M Smith, DP Harper, T Wu, S Wang, **M Li***. **(2023)** Ambient-densified and curcumin-functionalized transparent wood film for smart food packaging window. *iScience*, 26, 12. doi: 10.1016/j.isci.2023.108455 (2022 **IF 5.8**)

23. X Shi, K Wang, S Gao, D Zhang*, C Lai*, C Jin, **M Li**, C Wang, Q Yong, F Chu. **(2023)** Facile strategy to *in situ* synthesize gallic acid-modified lignin and its utilization for fabricating conductive and self-adhesive hydrogels as strain sensors. *Industrial & Engineering Chemistry Research.* 62, 43, 17765–17775. doi: 10.1021/acs.iecr.3c02652 (2022 **IF 7.6**)

24. Z Zhao, X Meng, Y Pu, **M Li**, Y Li, Y Zhang, AJ Ragauskas*. (**2023**) Bioconversion of homogeneous linear C-lignin to polyhydroxyalkanoates. *Biomacromolecules*, 24, 9, 3996–4004. doi: 10.1021/acs.biomac.3c00288 (2022 **IF 6.9**)

25. R Kheam, K Zhang, T Elder, NB Bryant, AJ Raguaskas, **M Li***. **(2023)** Totally chlorine-free peracetic acid pulping for nanocellulose isolation from hemp and poplar. *TAPPI Journal*, 22(8): 529. doi: 10.32964/TJ22.8.529

26. MW Reeder, **M Li**, M Li, T Wu. (**2023**) Corn cob hemicelluloses as stabilizer for ice recrystallization inhibition in ice cream. *Carbohydrate Polymers*, 318, 121127. doi: 10.1016/j.carbpol.2023.121127 (2022 **IF 10.7**)

27. J Liu, X Shi, L Ma, D Zhang*, C Lai*, C Wang, **M Li,** AJ Ragauskas, F Chu, Y Xu. (**2023**) Facile design of renewable lignin copolymers by photoinitiated RAFT polymerization as pickering emulsions stabilizers. *Green Chemistry*. 25, 5428–5437. doi: 10.1039/D3GC01500A (2022 **IF 11.1**)

28. X Shi, S Gao, C Jin, D Zhang*, C Lai*, C Wang, F Chu, AJ Ragauskas, **M Li***. (**2023**) A facile strategy to fabricate lignin-based thermoset alternative to formaldehyde-based wood adhesives. *Green Chemistry*. 25, 5907–5915. doi: 10.1039/D3GC00763D (2022 **IF 11.1**)

29. R Zhang, Z Hu, Y Wang, H Hu, F Li, **M Li,** AJ Ragauskas, T Xia, H Han, J Tang, H Yu, B Xu, L Peng. **(2023)** Single-molecular insights into the breakpoint of cellulose nanofibers assembly during saccharification. *Nat. Commun*. 14, 1100. doi: 10.1038/s41467-023-36856-8 (2022 **IF 17.7**)

30. D Xie, Y Pu, X Meng, ND Bryant, K Zhang, W Wang, AJ Ragauskas, **M Li***. (**2022**) Effect of lignin structure on the physicochemical properties of lignin-grafted-poly(ε-caprolactone) and its application for water/oil separation. *ACS Sust Chem Eng*. 10, 16882–16895. doi: 10.1021/acssuschemeng.2c05495 (2021 **IF 9.22**)

31. J Liu, X Li, **M Li**, Y Zheng. (**2022**) *Book Chapter 6:* Lignin Biorefinery – lignin source, isolation, characterization, and bioconversion. *Advances in Bioenergy.* Elsevier Academic Press. ISBN: 978-0-323-98984-8, 211–270. doi: 10.1016/bs.aibe.2022.05.004

32. K Zhang, T Ren, D Harper, **M Li***. **(2022)** Development of antimicrobial films with cinnamaldehyde stabilized by ethyl lauroyl arginate and cellulose nanocrystals. *Food Pack Shelf Life*. 33, 100886. doi: 10.1016/j.fpsl.2022.100886 (2021 **IF 8.75**)

33. Z. Zhao, X. Meng, M. Senanayake, SV. Pingali, Y. Pu, **M. Li**, L. Ma, J. Xu, AJ. Ragauskas. (**2022**) Enhancing lignin dispersion and bioconversion by eliminating thermal sterilization. *ACS Sust Chem Eng*. 10, 3245–3254. doi: 10.1021/acssuschemeng.1c07787 (2020 **IF 8.19**)

34. L Yu, K Seabright, I Bajaj, D Keffer, DM Alonso, C-T Hsieh, **M Li**, H Chen, S Dai, Y Gandomi, C Maravelias, D Harper. (**2022**) Performance and economic analysis of organosolv softwood and herbaceous lignins to activated carbons as electrode materials in supercapacitors. *Front Energ Res*. doi:10.3389/fenrg.2022.849949 (2020 **IF 4.01**)

35. **M Li**, Y Pu, X Meng, F Chen, R. Dixon, AJ Ragauskas. (**2022**) Strikingly high amount of tricin-lignin observed from vanilla (*Vanilla planifolia*) aerial roots. *Green Chem*. 24, 259–270. doi: 10.1039/D1GC03625D (2020 **IF 10.18**)

36. S Zhang, S Bhagia, **M Li**, X Meng, AJ Ragauskas. (**2021**) Wood-reinforced Composites by Stereolithography with the Stress-whitening Behavior. *Compos B*. 206, 109773. doi: 10.1016/j.matdes.2021.109773 (2019 **IF 6.29**)

37. J Wang, J Jiang, Y Sun, X Wang, **M Li,** S Pang, R Ruan, AJ Ragauskas, YS Ok, D Tsang. (**2021**) Catalytic degradation of waste rubbers and plastics over zeolites to produce aromatic hydrocarbons. *J Cleaner Prod*. 309, 127469. doi: 10.1016/j.jclepro.2021.127469 (2019 **IF 7.25**)

38. X Li, **M Li**, Y Pu, AJ Ragauskas, N. Tharayil, J. Huang, Y Zheng. (**2021**) Degradation of aromatic compounds and lignin by marine protist *Thraustochytrium striatum*. *Process Biochemistry*. 107, 13–17. doi: 10.1016/j.procbio.2021.05.006 (2019 **IF 2.95**)

39. S Wasti, E Triggs, R Farag, M Auad, S Adhikari, D Bajwa, **M Li**, AJ Ragauskas. (**2021**) Influence of plasticizers on thermal and mechanical properties of biocomposite filaments made from lignin and polylactic acid for 3D printing. *Compos B.* 205, 108483. doi: 10.1016/j.compositesb.2020.108483 (2019 **IF 7.64**)

40. **M Li**, Y Pu, F Cheng, AJ Ragauskas. (**2021**) Synthesis and characterization of lignin-grafted-poly(ε-caprolactone) from different biomass sources. *New Biotechnol.* 60, 189–99. doi: 10.1016/j.nbt.2020.10.005 (2019 **IF 4.67**)

41. C Huang, Y Zhan, X Hao, Z Wang, **M Li**, X Meng, G Fang, AJ Ragauskas. (**2020**) Synergistic enhancement of nanocellulose foam with dual in situ mineralization and crosslinking reaction. *Intl J Biolog Macromol.* 165, 3198–205. doi: 10.1016/j.ijbiomac.2020.10.162 (2019 **IF 5.16**)

42. N Kothari, S Bhagia, Y Pu, CG Yoo, **M Li**, S Venketachalam, S Pattathil, R Kumar, CM Cai, MG Hahn, AJ Ragauskas, and CE Wyman. (**2020**) The effect of switchgrass plant cell wall properties on its deconstruction by thermochemical pretreatments coupled with fungal enzymatic hydrolysis or *Clostridium thermocellum* consolidated bioprocessing. *Green Chem*. 22, 7924–45. doi: 10.1039/D0GC02546A (2019 **IF 9.48**)

43. J Wang, J Jiang, X Wang, S Pang, Y Sun, X Meng, **M Li**, R Ruan, AJ Ragauskas. (**2020**) Enhanced BTEX formation via catalytic fast pyrolysis of styrene-butadiene rubber: Comparison of different catalysts. *Fuel*. 278, 118322. doi: 10.1016/j.fuel.2020.118322 (2019 **IF 5.58**)

44. C Huang, G Fang, Y Zhou, X Du, L Yu, X Meng, **M Li**, CG Yoo, B Chen, S Zhai, Q Guan, Q Yong, AJ Ragauskas. (**2020**) Increasing the carbohydrate output of bamboo using a combinatorial pretreatment. *ACS Sust Chem Eng*. 8, 7380–93. doi: 10.1021/acssuschemeng.0c01126 (2019 **IF 7.63**)

45. J Wang, J Jiang, X Meng, **M Li**, X Wang, S Pang, K Wang, Y Sun, Z Zhong, R Ruan, AJ Ragauskas. (**2020**) Promoting aromatic hydrocarbon formation via catalytic pyrolysis of polycarbonate wastes over Fe- and Ce-loaded aluminum oxide catalysts. *Environ Sci Technol.* 54, 8390–400. doi: 10.1021/acs.est.0c00899 (2019 **IF 7.86**)

46. W Li, N Wanninayake, X Gao, **M Li**, Y Pu, DY Kim, AJ Ragauskas, J Shi. (**2020**) Mechanistic insight into lignin slow pyrolysis by evolved gas analysis and heart-cutting GC/MS. *ChemSusChem*. 8, 15843–54. doi: 10.1021/acssuschemeng.0c03423 (2019 **IF 7.96**)

47. B Ai, W Li, J Woomer, **M Li**, Y Pu, Z Sheng, L Zheng, A Adedeji, AJ Ragauskas, J Shi. (**2020**) Natural deep eutectic solvents mediated extrusion for continuous high-solid pretreatment of lignocellulosic biomass. *Green Chem.* 22, 6372–83. doi: 10.1039/D0GC01560A (2018 **IF 9.41**)

48. **M Li**, Y Pu, VM Thomas, CG Yoo, S Ozcan, Y Deng, K Nelson, AJ Ragauskas. (**2020**) Recent advancements of plant-based natural fiber–reinforced composites and their applications. *Compos B.* 200, 108254. doi: 10.1016/j.compositesb.2020.108254 (2019 **IF 7.64**).

49. J Zhuang, **M Li**, Y Pu, AJ Ragauskas, CG Yoo. (**2020**) Observation of potential contaminants in processed biomass using Fourier Transform Infrared Spectroscopy. *Appl Sci*. 10(12), 4345. doi: 10.1016/j.nbt.2020.10.005 (2019 **IF 2.47**)

50. X Meng, Y Pu, **M Li**, AJ Ragauskas. (**2020**). A novel green biomass pretreatment using cellulose-derived solvent Cyrene. *Green Chem.* 22, 2862–72. doi: 10.1039/D0GC00661K (2018 **IF 9.41**)

51. J He, C Huang, C Lai, C Huang, **M Li**, Y Pu, AJ Ragauskas, Q Yong. (**2020**). The effect of lignin degradation products on the generation of pseudo-lignin during dilute acid pretreatment. *Ind. Crops Prod*. 146, 112205. doi: 10.1016/j.indcrop.2020.112205 (2019 **IF 4.19**)

52. X Meng, B Scheidemantle, **M Li**, YY Wang, X Zhao, M Toro-González, P Singh, Y Pu, CE Wyman, S Ozcan, CM Cai, AJ Ragauskas. (**2020**). Synthesis, characterization, and utilization of a lignin-based adsorbent for effective removal of Azo dye from aqueous solution. *ACS Omega*. 5 (6), 2865–77. doi: 10.1021/acsomega.9b03717 (2018 **IF 2.58**)

53. L Liang, S Bhagia, **M Li**, C Huang, AJ Ragauskas. (**2020**) Cross-linked nanocellulosic materials and their applications. *ChemSusChem*. 13 (1), 78–87. doi: 10.1002/cssc.201901676 (2019 **IF 7.08**)

54. X Li, **M Li**, Y Pu, AJ Ragauskas, Y Zheng. (**2020**) Black liquor valorization by using marine protist *Thraustochytrium striatum* and preliminary metabolic mechanisms study. *ACS Sustain. Chem. Eng*. 8 (4), 1786–96. doi: 10.1021/acssuschemeng.9b05696 (2019 **IF 6.97**)

55. X Li, **M Li**, Y Pu, AJ Ragauskas, Y Zheng. (**2020**) Simultaneous depolymerization and fermentation of lignin into value-added products by the marine protist, Thraustochytrium striatum. *Algal Res*. 46: 101773. doi: 10.1016/j.algal.2019.101773 (2019 **IF 3.72**)

56. J Zhang, M Xie, **M Li**, J. Ding, Y Pu, AC Bryan, W. Rottmann, KA Winkeler, et al. (**2019**) Overexpression of a prefoldin β subunit gene reduces biomass recalcitrance in the bioenergy crop Populus. *Plant Biotechnol*. 18, 859–71. doi: 10.1111/pbi.13254 (2019 **IF 6.84**)

57. S Zhang, **M Li**, N Hao, AJ Ragauskas. (**2019**) Stereolithography 3D printing of lignin-reinforced composites with significantly enhanced mechanical properties. *ACS Omega.* 4, 20197–204. doi: 10.1021/acsomega.9b02455 (2019 **IF 2.58**)

58. **M Li**, CG Yoo, Y Pu, AK Biswal, AK Tolbert, D Mohnen, AJ Ragauskas. (**2019**) Downregulation of pectin biosynthesis gene *GAUT4* leads to reduced ferulate and lignin-carbohydrate cross-linking in switchgrass. *Commun. Biol*. 2: 22. doi: 10.1038/s42003-018-0265-6

59. J Zhang, **M Li**, AC Bryan et al. (**2019**) Overexpression of a serine hydroxymethyltransferase increases biomass production and reduces recalcitrance in the bioenergy crop *Populus*. *Sustain. Energ Fuels*. 3, 195–207. doi: 10.1039/C8SE00471D (2019 **IF 4.91**)

60. J Wang, C Xu, Z Zhong, A Deng, N Hao, **M Li**, X Meng, AJ Ragauskas. (**2019**) Catalytic conversion of bamboo sawdust over ZrO2-CeO2/γ-Al2O3 to produce ketonic hydrocarbon precursors and furans. *Energ. Conv. Manag*. 180, 60–71. doi: 10.1021/acssuschemeng.8b01873 (2019 **IF 7.18**)

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66. L Yao, C Chen, CG Yoo, X Meng, **M Li**, Y Pu, AJ Ragauskas, C Dong, H Yang. (**2018**) Insights of ethanol organosolv pretreatment on lignin properties of *Broussonetia papyrifera*. *ACS Sustain. Chem. Eng*. doi: 10.1021/acssuschemeng.8b03290 (2018 **IF 6.97**)

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85. Q Wu, N Hao, T Wells, X Meng, **M Li**, Y Pu, S Liu, AJ Ragauskas. (**2017**) Characterization of products from hydrothermal carbonization of pine. *Biores. Technol.* 244 (1) 78–83. doi: 10.1016/j.biortech.2017.07.138 (2017 **IF 5.81**)

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90. Y Pu, X Meng, CG Yoo, **M Li,** AJ Ragauskas. (**2016**) Analytical methods for biomass characterization during pretreatment and bioconversion. Book Chapter in *Valorization of Lignocellulosic Biomass in a Biorefinery: From Logistics to Environmental and Performance Impact*. Editors: Rajeev Kumar et al. Nova Science. ISBN: 978-1-63485-827-4.

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94. PS Bass, L Blue, L Zhang, **M Li,** ZY Cheng, M Tu. (**2015**) Modeling of the time-dependent strain response of electroactive NCC-PEO and PVDF composites. *Proc. SPIE 9430, Electroactive Polymer Actuators and Devices.* doi: 10.1117/12.2085260

95. C Lai, M Tu, **M Li,** S Yu. (**2014**) Remarkable solvent and extractable lignin effects on enzymatic digestibility of organosolv pretreated hardwood. *Biores. Technol.* 156, 92–9. doi: 10.1016/j.biortech.2014.01.030 (2014 **IF 4.49**)

96. **M Li**, M Tu, D Cao, P Bass, S Adhikari. (**2013**) Distinct roles of residual xylan and lignin in limiting enzymatic hydrolysis of organosolv pretreated loblolly pine and sweetgum. *J. Agric. Food Chem*. 61 (3), 646–54. doi: 10.1021/jf304517w (2013 **IF 3.11**)

INVITED TALKS

1. Design and Engineer Cellulose/Metal-Organic Framework Hybrids for Multi-functional Materials. ***Kansas State University***, Oct. 2025, Manhattan, KS.

2. Design and Engineer Cellulose/Metal-Organic Framework Hybrids for Functional Adsorbents and Luminescent Sensors. ***FBP Young professional Award invited session***, ***AIChE Annual Meeting***, Oct. 2024, San Diego, CA.

3. Design Cellulose/Metal-organic Framework Hybrids for Functional Adsorbents and Luminescent Sensors. ***Frontiers in Biorefining International Meeting***, Oct. 2024, St. Simons Island, GA.

4. Biorefinery and Modification of Plant Cell Walls: Where Do We Stand? **Institute of Chemical Industry of Forest Products (ICIFP), Chinese Academy of Forestry**, Jul. 2024, Nanjing, China.

5. Cellulose Nanofiber-templated Metal-organic Frameworks for Fluorescent Detection of Methyl Parathion Pesticides. **Nanjing Forestry University**, Jul. 2024, Nanjing, China.

6. Cellulose Nanofiber-templated Metal-organic Frameworks for Fluorescent Detection of Methyl Parathion Pesticides. **Northeast Forestry University**, Jul. 2024, Harbin, China.

7. Keynote Speech: Biorefinery and Modification of Plant Cell Walls: Where Do We Stand? RBI Spring 2024 Workshop, ***Georgia Institute of Technology***, March 5, 2024, Atlanta, GA.

8. *Convert Lignocellulosic Biomass into Functional Materials and Biodegradable Polymers*. ***Auburn University***, Oct. 31, 2023, Auburn, AL.

9. What else can trees and grasses bring to our life? Virtual Science Club, ***Southern Appalachian Science and Engineering Fair***, Sept. 19, 2023, Virtual.

10. Development of nanocellulose-based antimicrobial packaging materials and functional composites. ***Huazhong Agricultural University*** (China), 3rd ICUAFW, Nov. 2022, Virtual.

11. Antimicrobial food packaging with cinnamaldehyde stabilized by ethyl lauroyl arginate and cellulose nanocrystals. ***Frontiers in Biorefining***, Oct. 2022, St. Simons Island, GA.

12. Development of lignocellulose-based products: biomass recalcitrance and lignin-derived absorbents and copolymers. ***Northeast Forestry University*** (China), Oct. 2021, Virtual.

13. Insight of biomass recalcitrance reduction and lignin valorization. ***Oregon State University***, Oct. 2020, Virtual.

14. Structural variation in biomass: recent advances and their significance to reduced biomass recalcitrance and lignin valorization. ***Auburn University***, Oct. 2020, Virtual.

15. Synthesis and characterization of lignin-grafted-poly(ε-caprolactone) from different biomass sources. ***International Congress on Sustainability Science & Engineering (ICOSSE '20)***, Aug 3-5, 2020, AIChE Virtual.

16. Identification of Tricin, Flavonoids, and Pretreatment Impurities For Biorefinery Using of ^{31}P NMR. ***Aston University UK*** *visiting guests*. Nov. 2019, Knoxville, TN.

17. Chemical structural changes of cellulose, hemicellulose, lignin, and lignin-carbohydrate crosslinking in switchgrass for biorefinery and saccharification. *Department of Forestry Biomaterials,* ***North Carolina State University***, Nov. 2018, Raleigh, NC.

18. Effects of lignin-carbohydrate cross-linkages on biomass recalcitrance and biorefinery. *Center for Renewable Carbon,* ***The University of Tennessee Institute of Agriculture***, Nov. 2018, Knoxville, TN.

19. Improvement of mechanical strength of cellulose nano-fibril bundle reinforced PP and PLA. *School of Chemical and Biomolecular Engineering,* ***Georgia Institute of Technology***, Oct., 2018, Atlanta, GA.

20. Structural changes of the biopolymers in genetically modified switchgrass and their significance to the reduced biomass recalcitrance. *Chemical and Biomolecular Engineering (CBE) Graduate Seminar,* ***The University of Tennessee****,* Feb. 2017, Knoxville, TN.

21. Lignin structural changes during pretreatment structure in different feedstock sources. ***Solvay Chemical Company*** *visiting guests*. Jul. 2016, Oak Ridge, TN.

22. Structural characterization of cellulose, hemicellulose, and lignin from *GAUT4* down-regulated switchgrass. ***DOE BioEnergy Science Center****-Enabling Technologies Annual Workshop*, Jan. 2016, Riverside, CA.

23. The way to renewable energy: effects of lignin and xylan on the enzymatic hydrolysis of organosolv pretreated biomass. *School of Forestry and Wildlife Sciences Seminar Series*, ***Auburn University***, Nov. 2012, Auburn, AL.

SELECTED PRESENTATIONS (* corresponding author)

1. Y Wang, **M Li***. Comparative Study of the Impacts of Fractionation Methods Using Solvent Exchange, Acid Precipitation and Ultrafiltration on the Physicochemical Features of Lignin. ***AIChE 2025 Annual Meeting***, Nov. 2025, Boston, MA. (Oral)

2. A Coleman, **M Li***. Narrowing Down the Size Distribution of Lignin for Better Bio-Based Foams. ***2025 SMaRT Symposium***, July 29-30, 2025, UTK, TN. (Oral)

3. A Coleman, **M Li***. Narrowing Down the Size Distribution of Lignin for Better Bio-Based Foams. ***2025 Summer Research Scholars Poster Symposium***, July 24, 2025, UTK, TN. (Poster)

4. **M Li***. Combination of Nanocellulose and Metal-organic Framework for Multi-functional Materials: Adsorbents and Sensors. *CSABE-ASABE AIM 2025*, July 2025, Toronto, Ontario, Canada. (Poster)

5. **M Li***. Combination of Nanocellulose and Metal-organic Framework for Multi-functional Materials: Adsorbents and Sensors. ***S-1075 Multi-State Symposium on Science and Technology Driving the Bioeconomy***, July 2025, Fargo, ND. (Poster)

6. C Cronley*, S Kim, N Zhou, **M Li**. Enhancing Energy Security for Low-Income Households: The Impact of Housing Retrofits and Policy Frameworks. ***European Network for Housing Research (ENHR) Grand Paris 2025***, July 2025, Créteil, France. (Oral)

7. Ryan Baskette, **M Li***. Design of Cellulose/Metal-Organic Framework Sorbents for Pollutant Removal. ***UTK Exhibition of Undergraduate Research and Creative Achievement (EURēCA)***, April, 2025, Knoxville, TN. (Poster)

8. **M Li***, K Zhang. Develop cellulose and metal−organic frameworks functional filament using ionic liquids. ***ACS Spring 2024 National Meeting & Exposition***, March 2025, San Diego, CA. (Oral)

9. D. Gomez-Maldonado, M Bortner, **M Li**, E Espinosa, A Rodriguez, B Higgins, M Peresin. Surface energy and interface modulation in silver-functionalized CNF hydrogels for water purification. ***ACS Spring 2024 National Meeting & Exposition***, March 2025, San Diego, CA. (Oral)

10. AJ Ragauskas, **M Li**, W Wang, S Zhang, T McCoy. Design lignin-based and fluorocarbon-free omniphobic textile coatings. *DoD Energy and Environment Innovation Symposium*, December 2024, Washington DC. (Poster)

11. M Shokri, **M Li***. The ring-opening (co)polymerization (RCOP) of 3,4- dihydrocoumarin and its isomers for aromatic-aliphatic polyesters. ***Frontiers in Biorefining***, October 2024, St. Simons Island, GA. (Poster)

12. K Zhang, **M Li***. The Potential of Cellulose Templating Metal-organic Frameworks for Functional Materials. ***Frontiers in Biorefining***, October 2024, St. Simons Island, GA. (Poster)

13. S Zhang, **M Li**, AJ Ragauskas. Lignin-Based Coating for Superhydrophobic Applications. Forest Bioproducts Division Young Professional Award Session, ***AIChE 2024 Annual Meeting***, Oct. 2024, San Diego, CA. (Oral)

14. **M Li** and K Zhang. Design and Engineer Cellulose/Metal-organic Frameworks Hybrids for Functional Adsorbents and Luminescent Sensors. *ASABE 2024 Annual International Meeting*, July 2024, Anaheim, CA. (Poster)

15. C Cross, K Zhang, **M Li***. Combination of nanocellulose and metal-organic frameworks for luminescent functional materials. ***2024 SMaRT Symposium***, July 2024, UTK, TN. (Oral)

16. C Cross, K Zhang, **M Li***. Combination of nanocellulose and metal-organic frameworks for luminescent functional materials. ***2024 Summer Research Scholars Poster Symposium***, July 2024, UTK, TN. (Poster)

17. **M Li**. Engineer and Develop Lignocellulose-Derived Functional Materials and Upcyclable Polymers. ***UTK AgResearch Circular Bioeconomy Systems Workshop***, May 2024, Knoxville, TN. (Poster)

18. Ryan Baskette, K Zhang, **M Li***. Design of Cellulose/Metal-Organic Framework Sorbents for Pollutant Removal. ***UTK Exhibition of Undergraduate Research and Creative Achievement (EURēCA)***, April 23, 2024, Knoxville, TN. (Poster)

19. D Xie, **M Li***. Designing robust superhydrophobic coatings with Lignin Micro-nanospheres and its Polydimethylsiloxane Derivatives. ***ACS Spring 2024 National Meeting & Exposition***, Mar 2024, New Orleans, LA. (Oral)

20. K Zhang, MD Smith, **M Li***. Molecular insight into the in situ assembly of metal−organic frameworks on TEMPO-oxidized cellulose. ***ACS Spring 2024 National Meeting & Exposition*****,** Mar 2024, New Orleans, LA. (Oral)

21. M Peresin, Y Nan, E Mayson, **M Li**, K Zhang, D Gomez-Maldonado. Nanocellulose-based sustainable 3-D structural adsorbents for environment remediation. ***ACS Spring 2024 National Meeting & Exposition***, Mar 2024, New Orleans, LA. (Oral)

22. I Sutton, **M Li***. Wood-Based Metal-organic Frameworks Composites for Potential Pesticide Adsorption. ***UTK Discovery Day Symposium***, September 2023, Knoxville, TN. (Poster)

23. M Hamilton, K Zhang, **M Li***. In situ growth of AIE-based metal-organic frameworks in wood for the development of luminescent paper. ***2023 SMaRT Symposium***, July 2024, UTK, TN. (Oral)

24. M Hamilton, K Zhang, **M Li***. In situ growth of AIE-based metal-organic frameworks in wood for the development of luminescent paper. ***2023 Summer Research Scholars Poster Symposium***, July 2024, UTK, TN. (Poster)

25. **Mi Li*** et al. Nanocellulose-lauroyl arginate-stablized pickering emulsion for antimicrobial food packaging. ***ASABE Annual International Meeting 2023***, July 2023, Omaha, NE. (Oral)

26. Kailong Zhang and **M Li***. Cellulose nanofibers templated metal-organic frameworks for fluorescent-visual detection and adsorption of pesticides. ***ACS Spring 2023 National Meeting & Exposition***, Mar 2023, Indianapolis, MN. (Oral)

27. D Xie and **M Li***. Development of removable and repairable hydrophobic polyimine coating with lignin and pendent aminopropylsilicones. ***ACS Spring 2023 National Meeting & Exposition***, Mar 2023, Indianapolis, MN. (Oral)

28. K Zhang and **M Li***. Sulfonated cellulose nanofibers templated metal–organic frameworks for the rapid dye removal. ***Frontiers in Biorefining International Meeting***, October 2022, St. Simons Island, GA. (Poster)

29. **M Li***et al. Physicochemical characterization of lignins using inverse gas chromatography and dynamic vapor sorption. ***ASABE Annual International Meeting 2022***, July 2022, Houston, TX. (Oral)

30. K Zhang and **M Li*** Antimicrobial food packaging with cinnamaldehyde stabilized by ethyl lauroyl arginate and cellulose nanocrystals. ***USDA S-1075 2022***, July 2022, Houston, TX. (Poster)

31. R Kheam, T Elder, S Wang, **M Li**. Totally chlorine-free peracetic acid pulping for nanocellulose isolation. ***ACS Spring 2022 National Meeting & Exposition***, Mar 2022, San Diego, CA. (Oral)

32. D Xie and **M Li***. Effect of lignin molecular weight on structural and thermal properties of synthetic lignin-grafted-poly(ε-caprolactone). ***ACS Spring 2022 National Meeting & Exposition***, Mar 2022, San Diego, CA. (Oral)

33. K Zhang, M Tu, D Harper, S Cui, **M Li***. Development of antimicrobial films with cinnamaldehyde stabilized by ethyl lauroyl arginate and cellulose nanocrystals. ***ACS Spring 2022 National Meeting & Exposition***, Mar 20229, San Diego, CA. (Oral)

34. **Mi Li** et al. Surface characterization of technical lignins using inverse gas chromatography. ***Sorption Science Symposium 2021***, Sept 2021. Virtual. (Poster)

35. **Mi Li** et al. Catalytic conversion of corn starch to high-value glucaric acid using nitroxyl radicals. ***ASABE Annual International Meeting 2021***, Jul 2021. Virtual. (Oral)

36. **Mi Li** et al. Improved dispersion and interfacial bonding between nanocellulose and poly(lactic acid) using solvent infiltration and ball milling methods. ***ACS Fall 2019 National Meeting & Exposition***, Aug 2019, San Diego, CA. (Oral)

37. **Mi Li** et al. Structural characterization of field-grown *COMT*-downregulated switchgrass and their importance to the reduced biomass recalcitrance. ***BioEnergy Science Center Annual Retreat Meeting***, July 2017, Chattanooga, TN. (Oral)

38. **Mi Li** et al. Lignin characterization revealing its structural diversity and tricin incorporation in vanilla tissues. ***BioEnergy Science Center Annual Retreat Meeting***, July 2017, Chattanooga, TN. (Poster)

39. **Mi Li** et al. A Four-year comparative analysis of lignin structural changes in *COMT* down-regulated switchgrass with reduced-recalcitrance phenotype. ***The 39th Symposium Biotechnology for Fuels and Chemicals***, May 2017, San Francisco, CA. (Oral)

40. **Mi Li** et al. Study of lignin, cellulose, and lignin-associated sugars in *GAUT4* down-regulated switchgrass cell walls and their significance to the reduced-recalcitrance phenotype of this biomass feedstock. ***BioEnergy Science Center Annual Retreat Meeting***, June 2016, Chattanooga, TN. (Oral)

41. **Mi Li** et al. Structural characterization of populus variants following pretreatment and biological digestion by fungal enzymes and CBP. ***The 38th Symposium Biotechnology for Fuels and Chemicals***, April 2016, Baltimore, MD. (Oral)

42. **Mi Li** et al. Surface Functionalization of nanocrystalline cellulose. ***2014 AIChE Annual Meeting***, November, 2014, Atlanta, GA. (Poster)

43. **Mi Li** et al. Value added co-product lactic acid development from lignocellulosic biomass sugars. ***2013 AIChE Annual Meeting***, November, 2013, San Francisco, CA. (Oral)

44. **Mi Li** et al. Distinct roles of lignin and xylan on the enzymatic hydrolysis of organosolv pretreated biomass. ***2012 AIChE Annual Meeting***, November, 2012, Pittsburg, PA. (Oral)

45. **Mi Li** et al. Fermentability of organosolv prehydrolysates from Loblolly Pine and Sweetgum. ***22nd Annual Graduate Scholars Forum***, February 2012, Auburn AL. (Oral)

COMMUNITY SERVICE AND VOLUNTARY WORK

2025–present	**Secretary**, ES-02/03 BioEnergy Science Community, ASABE
2025	**Search Committee Member**, Assistant/Associate Professor for UT-ORII
2024–present	**AgDay Representative,** School of Natural Resources, UTK
2024–present	**Strategic Plan Committee,** School of Natural Resources, UTK
2023–present	**Event Coordinator**, East Tennessee-ACS Local Section (ETS-ACS)
2023–present	**Editorial Board Member**, "*Frontiers in Energy Research*" journal
2021–2025	**Vice-/Chair**, ES-220 Bio-based Energy, Fuels and Products Committee, ASABE
2021–present	**Proposals Reviewer** USDA Sun Grant Program (West 2022, Northeast 2023) USDA McIntire-Stennis Program (internal university), 2023 Foundation for Food & Agriculture Research Grant, 2023 USDA McIntire-Stennis Program, regional, 2023 ORAU Ralph E. Powe Junior Faculty Enhancement Grant, 2022-2023 DOE's Experimental Program to Stimulate Competitive Research Grant, 2021
2023	**Organization Committee Chair**, Monthly Seminar Series at CRC
2022	**Search Committee Member**, Assistant/Associate Professor for CRC, UT **Search Committee Member**, Business Manager for CRC, UT

2022	**Poster Judge**, The 6th Frontiers in Biorefining International Conference 2022
2021–2022	**Vice-Chair**, ES-220 Bio-based Energy, Fuels and Products Committee, ASABE
2021–2022	**Organizer**, ACS Annual Conference CELL Division, Fall 2021 and Spring 2022
2021	**Search Committee Member**, Recruiting Account Specialist for CRC, UT
2021–present	**Moderator**, ES-220 Thermo-conversion of Biomass to Biofuels, ASABE AIM
2021–present	**Editorial Board Member**, "Bio-energy" topic for *Energies* journal; Biology "Biotechnology" Section for *Biology* journal
2020–2021	**Guest Editor**, *Frontiers in Plant Science* (Plant Biotechnology): Plant Cell Wall Polysaccharides as Biofuels and Biomaterials
2020–2021	**Secretary**, Assoc. of Overseas Chinese Agricultural Biological & Food Engineers
2017	**Judge**, the poster section of the 39th SBFC (San Francisco, CA)
2015–present	**Judge**, Tennessee Science Bowl (K-12 STEM) competition
2015–present	**Reviewer** for scholarly journals, such as *Green Chem., ACS Sust. Chem. Eng., Biores. Technol., Biotechnol. Biofuels, Carbohydr. Polym., Cellulose, Energy Convers. Manag., Energy & Fuels, Environ. Sci., Food Chem., Front. Energ. Res., Ind. Crop Prod., Int. J. Polym. Sci., J. Agri. Food Chem., Renew. Engergy, TAPPI, etc.*
2015–2017	**Council Member**, DOE BioEnergy Science Center Young Scholars Council
2014	School of Forestry and Wildlife Science 2nd Annual Spring Fling and Outdoor Expo

ACADEMIC AND PROFESSIONAL MEMBERSHIP

2023–present	Life-time membership, Γ Σ Δ – the Honors Society of Agriculture-TN
2020–present	Regular membership, American Society of Agricultural & Biological Eng. (ASABE)
2020–present	Regular membership, American Institute of Chemical Engineers (AIChE)
2018–present	Regular membership, American Chemical Society (ACS)
2016–2020	Regular membership, Society for Industrial Microbiology & Biotechnology (SIMB)
2016–2020	Regular membership, National Postdoctoral Association
2014–2015	The Honor Society of Phi Kappa Phi
2012–2013	Graduate Student Membership, American Institute of Chemical Engineers
2011–2014	Graduate Student Membership, Forest Products Society
2011–2014	Graduate Student Membership, Microbiology Club, Auburn University

MENTORSHIP

---------- *Graduate Students* ----------

Time	Name	Level	Affiliation-in	Affiliation-out
2024–present	You Wang	Ph.D.	Northeast Forestry U.	n/a
2024–present	Mastaneh Shokri	Ph.D.	Azad U. of Sanand	n/a
2021–2025	Kailong Zhang	Ph.D.	Shaanxi Normal U.	University of Kentucky
2021–2024	Di Xie	Ph.D.	Nanjing Forest U.	Saras Micro Devices
2021–2022	Rithany Kheam	M.S.	U. Mass. Amherst	University of Tennessee

---------- Undergraduate Students ----------

Time	Name	Affiliation-in	Affiliation-out
2025–2025	Alicia Coleman	Allen University	n/a
2024–2024	Charley Cross	Jackson State Univ.	n/a
2023–present	Ryan Baskette	UTK	n/a
2023–2023	Makayla Hamilton	Tougaloo College	n/a
2022–2023	Isaac Sutton	UTK	n/a
2022–2022	Zhen Gong	UTK	n/a
2021–2022	Camryn Crowe	UTK	Colortech Inc.
2020–2022	Emily Van Auken	UTK	SNS @ ORNL
2020–2021	Allison Warren	UTK	Graduate School @ UTK
2020–2020	Megan Abella	UTK	UTK

---------- Postgraduate Students ----------

Time	Name	Level	Affiliation-in	Affiliation-out
2025–present	Saurabh Kardam	Ph.D	NCSU	n/a
2023–2024	Mastaneh Shokri	M.S.	Azad U. of Sanand	U of Tennessee (PhD)

---------- Visiting Scholars ----------

Time	Name	Title	Affiliation-in
04/2024– present	Yangmei Chen	Associate Professor	South China Agricultural University