Joshua Tropp, Ph.D.

Assistant Professor of Chemistry & Biochemistry
College of Arts & Sciences, Texas Tech University,
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Education

2015 – 2020 **Ph.D. in Polymer Science and Engineering**
Department of Polymer Science and Engineering
University of Southern Mississippi, Hattiesburg, MS
Dissertation: Establishing Design Guidelines for Conjugated Polymer-Based Sensing Technologies for Environmental Monitoring
Advisor: Professor Jason D. Azoulay

2011 – 2015 **B.A. in Chemistry; ACS Certification**
Washington & Jefferson College, Washington, PA
Summa cum laude

Professional Appointments

2023 – Present **Assistant Professor**
Department of Chemistry & Biochemistry
Texas Tech University, Lubbock, TX

2020 – 2023 **Postdoctoral Research Associate: Organic Bioelectronics**
Department of Biomedical Engineering
Northwestern University, Evanston, IL
Advisor: Professor Jonathan Rivnay

2020 **Postdoctoral Research Associate: Chemical Sensing**
School of Polymer Science and Engineering
University of Southern Mississippi, Hattiesburg, MS
Advisor: Professor Jason D. Azoulay

Selected Academic Honors and Awards

2024 **WelchX Retreat Invitee** – Welch, Theme: Chemistry of Life
2022 **PMSE Future Faculty Awardee** – ACS, Division of Polymeric Materials Science and Engineering
2022 **Rising Star in Soft and Biological Matter** – MRSEC at the University of Chicago
2022 **Postdoc of the Month, August** – Northwestern University Postdoctoral Association
2022 **Postdoc Talk Competition Winner** – Georgia Institute of Technology
2020 **2020 CAS Future Leaders Program** – Chemical Abstract Services (CAS)
2019 **Graduate Student Hall of Fame (*One recipient per school*)** - The University of Southern Mississippi
2019 **3-Minute Thesis Grand Champion** – Graduate School, The University of Southern Mississippi
2019 **1st Place Poster Competition** – Applied Polymer Technology Extension Consortium
2018 **Graduate Competitive Travel Award** – University of Southern Mississippi
2016 **Graduate Research Traineeship** – National Science Foundation
2015 **Phi Beta Kappa Inductee (*One recipient per school*)** – Washington & Jefferson College
2015 **Jesse W. Lazear Book Prize** – Department of Chemistry, Washington & Jefferson College
2015 **Outstanding Senior Chemistry Major** – Society of Analytical Chemists of Pittsburgh
2015 **Samuel Jones Prize in Chemistry** (***Top Grade on Exam***) – Departments of Chemistry and Physics

Funding – Principal Investigator

2024 **ACS PRF DNI** – Nanoconfinement Enabled Synthetic Control of Conjugated Polymers - $110,000
2024 **WelchX Pilot Grant** – Unraveling the Role of Iron in the Gut Microbiome using Iron-Selective Organic Electrochemical Transistors - $100,000

Publications (Google Scholar Profile)

Journal Articles (chronological order) – (* denotes equally contributed first-author)

1. N. Wilson, B. Mete, N. Payne, **J. Tropp**, G. Botte, "Adaptable Pectin Extraction and Functional Group Impact on Electrolytes Suitable for Energy Storage Applications" *J. Electrochem. Soc.,* **2025**, *172,* 023505.
2. N. Gill, I. Srivastava, **J. Tropp** "Rational Design of NIR-II Emitting Conjugated Polymer Derived Nanoparticles for Image-Guided Cancer Interventions" *Adv. Health. Mater.* **2024**, *13*, 240197.
3. A. S. Mehta, S. L. Zhang, X. Xie, S. Khanna, **J. Tropp**, X. Ji, R. Daso, C. K. Franz, S. W. Jordan, J. Rivnay "Decellularized Biohybrid nerve promotes motor neuron projections" *Adv. Health. Mater*. **2024**, *13,* 2401875.
4. R. Wu, X. Ji, Q. Ma, B. D. Paulsen, **J. Tropp**, J. Rivnay "Direct quantification of ion composition and mobility in organic mixed ionic-electronic conductors" *Sci. Adv.* **2024**, *10,* eadn8628.
5. R. Keate, **J. Tropp**, R. Wu, A. Petty, E. Hsu, G. Ameer, J. Rivnay, "Decoupling the Influence of Poly(3,4-ethylenedioxythiphene)-Collagen Composite Characteristics on Cell Stemness" *Adv. Sci*. **2024**, *11,* 2305562. ***–Highlighted Research, Front Cover***
6. R. P. Trueman, O. Guillemot-Legris, H. T. Lancashire, A. S. Mehta, **J. Tropp**, R. E. Daso, J. Rivnay, A. B. Tabor, J. B. Phillips, B. C. Schroeder "Aligned Bioelectronic Polypyrrole/Collagen Constructs for Peripheral Nerve Interfacing" *Adv. Eng. Mater*. **2024**, *26,* 2301488.
7. **J. Tropp**, C. P. Collins, X. Xie, R. E. Daso, A. S. Mehta, S. P. Patel, M. M. Reddy, S. E. Levin, C. Sun, J. Rivnay, "Conducting polymer nanoparticles with intrinsic aqueous dispersibility for conductive hydrogels" *Adv. Mater.* **2024***, 36,* 2306691. ***Top 10% of Most-Viewed Papers of Adv. Mater. from 2024***
8. **J. Tropp**, D. Meli, J. Rivnay, "Organic Mixed Conductors for Electrochemical Transistors" *Matter.* **2023***, 6,* 3132. ***–Highlighted Research, Front Cover***
9. **J. Tropp**,* D. Meli,* R. Wu, B. Xu, S. Hunt, J. Azoulay, B. Paulsen, J. Rivnay, "Revealing the Impact of Molecular Weight on Mixed Conduction in Glycolated Polythiophenes Through Electrolyte Choice" *ACS Mater. Lett.,* **2023***, 5*, 1367.
10. **J. Tropp**, "Biomaterial Platforms Offer Capability of Efficacious Male Contraceptives" *MRS Bull*. **2022**, *47*, 649.
11. **J. Tropp**, A. S. Mehta, R. Wu, M. M. Reddy, A. Petty, J. Rivnay, "Versatile Poly (3, 4-ethylenedioxythiophene) Polyelectrolytes for Bioelectronics by Incorporation of an Activated Ester" *Chem. Mater.,* **2022***, 35*, 41.
12. M. H. Ihde,* **J. Tropp**,* M. Diaz, A. M. Shiller, M. Bonizzoni, J. D. Azoulay, "A Sensor Array for the Ultra-Sensitive Discrimination of Heavy Metal Pollutants in Seawater" *Adv. Funct. Mater.,* **2022**, *32*, 2112634.
13. R. L. Keate, **J. Tropp**, C. Collins, H. T. O. Ware, A. J. Petty, G. Ameer, C. Sun, J. Rivnay, "3D-printed electroactive hydrogel architectures with sub-100 μm resolution promote myoblast viability" *Macromol. Biosci*., **2022**, *22*, 2200103.
14. E. A. Schafer, R. Wu, D. Meli, **J. Tropp**, M. Moser, I. B. McCulloch, B. D. Paulsen, J. Rivnay, "Sources and Mechanisms of Degradation in P-type Thiophene-Based Organic Electrochemical Transistors" *ACS Appl. Electron. Mater.*, **2022**, *4,* 1391.
15. A. R. Benasco, **J. Tropp**, V. Kaphle, Y. Chen, W. Zhao, N. Eedugurala, A. Flood, J. D. Azoulay, "Macrocycle Induced Doping of Conjugated Polymer Transistors: Toward the Selective and Ultrasensitive Detection of Phosphate in Seawater" *Adv. Electron. Mater.,* **2022**, *7,* 2101353.

16. F. M. Fung,* S. Z. Jilani,* M. L. Ohnsorg,* R. L. Pinals,* M. Saraf,* **J. Tropp**,* P. Carlton, "How Early-Career Scientists Responded to the Space Created by the COVID-19 Pandemic with Resiliency" *ACS Cent. Sci.*, **2022**, *8,* 294-296.
17. S. Griggs, A. Marks, D. Meli, G. Rebetez, O. Bardagot, B. D. Paulsen, H. Chen, K. Weaver, M. I. Hugraha, E. A. Shafer, **J. Tropp**, C. M. Aithison, T. D. Anthopoulos, N. Baneerji, J. Rivnay, I. McCulloch, "The effect of residual palladium on the performance of organic electrochemical transistors" *Nat. Commun*. **2022**, *13,* 7964.
18. **J. Tropp**, J. Rivnay, "Design of Biodegradable and Biocompatible Conjugated Polymers for Bioelectronics" *J. Mater. Chem. C* **2021***, 9*, 13543-13556*.* ***–Highlighted Research, "HOT Paper" and Front Cover.***
19. R. L. Keate, **J. Tropp**, J. Rivnay, "A Collagen-Conducting Polymer Composite with Enhanced Chondrogenic Potential" *Cell Mol. Bioeng.* **2021***, 14,* 501-512*.*
20. P. R. Paudel, **J. Tropp**, V. Kaphle, J. D. Azoulay, B. Lussem, "Organic Electrochemical Transistors – From Device Models to a Targeted Design of Materials" *J. Mater. Chem. C* **2021***, 9,* 9761-9790*.*
21. E. R. King, **J. Tropp**, N. Eedugurala, L. E. Gonce, S. Stanciu, J. D. Azoulay, "Gold Catalyzed Direct C-H Activation Polymerization for the Synthesis of Aromatic Polymers" *Angew. Chem.* **2020***, 132,* 22155-22159. ***–Highlighted Research, Supplemental Cover***
22. **J. Tropp**, M. H. Ihde, E. R. Crater, N. C. Bell, R. Bhatta, I. C. Johnson, M. Bonizzoni, J. D. Azoulay, "A Sensor Array for the Nanomolar Detection of Azo Dyes in Water" *ACS Sens.* **2020**, *5*, 1541-1547.
23. S. Davis, D. Nugegoda, **J. Tropp**, J. D. Azoulay, J. H. Delcamp, "Molecular Au(I) Comlexes in the Photosensitized Photocatalytic CO_2 Reduction Reaction" *MRS Commun*. **2020**, *10*, 252-258. ***–Highlighted Research, Front Cover***
24. W. Zhao, **J. Tropp**, B. Qiao, M. Pink, J. D. Azoulay, A. H. Flood, "Tunable Adhesion from Stoichiometry-controlled Supramolecular Polymers emerge using Cyanostar-stabilized Anion-anion Attraction" *J. Am. Chem. Soc*., **2020**, *142*, 2579−2591.
25. **J. Tropp**, M. H. Ihde, A. K. Williams, N. J. White, N. Eedugurala, N. C. Bell, M. Bonizzoni, J. D. Azoulay, "A Sensor Array for the Discrimination of Polycyclic Aromatic Hydrocarbons Using Conjugated Polymers and the Inner Filter Effect" *Chem. Sci.,* **2019**, *10*, 10247−10255*.* ***–Highlighted Research, Back Cover***
26. A. E. London, H. Chen, M. A. Sabuj, **J. Tropp**, B. A. Zhang, Y. Liu, X. Gu, B. Wong, N. Rai, M. K. Bowman, J. D. Azoulay, "A High Spin Ground State Donor-Acceptor Conjugated Polymer" *Sci. Adv., 5(5)*, eaav2336, **2019**.
27. W. Zhao, B. Qiao, **J. Tropp**, M. Pink, J. D. Azoulay, A. H. Flood* "Anion Dimers Drive Supramolecular Polymerization of Telechelic Di-phosphonates inside Cyanostar Macrocycles" *J. Am. Chem. Soc.* **2019**, *130*, 10464–10465. ***–Highlighted Research, Supplemental Cover***
28. A K. Williams,* **J. Tropp**,* E. R. Crater, N. Eedugurala, J. D. Azoulay, "Thiol-Ene Click Post-Polymerization Modification of a Fluorescent Conjugated Polymer for Parts-per-Billion Pyrophosphate Detection in Seawater" *ACS Appl. Polym. Mater.* **2019***, 1*, 309−314.
29. A. E. London, L. Huang, B. A. Zhang, M. B. Oviedo, **J. Tropp**, W. Yao, Z. Wu, B. M. Wong, T. N. Ng, J. D. Azoulay "Donor−Acceptor Polymers with Tunable Infrared Photoresponse" *Polym. Chem.*, **2017***, 8, 2922−2930.* ***–Highlighted Research, Back Cover***

Manuscripts submitted, in review, or in press:

30. R. Posey,[†] N. Gill,[†] D. Fernandez, L. G. F. Dos Santos, H. Garza, J. Tran, B. Alfaro, N. Payne, T. A. Oyshi, C. Cashman, B. Salinas, I. Srivastava, U. Bickel, H. Lischka, **J. Tropp**, "Tuning the Structure of Thienoisoindigo (TIG) Copolymers to afford Bright Near Infrared Emission for Bioimaging Through Aggregation-Enhanced Emission" **2025**, *In Review.*
-Invited to J. Mater. Chem. B for Thematic Issue on Materials Developments in Cancer Therapeutics.
31. R. L. Keate, P. Kouassi, C. L. Dunton, H. Wang, **J. Tropp**, J. Rivnay, V. Backman, G. A. Ameer, "Directing Cell Differentiation via PEDOT-mediated Ionic Environments" **2025**, *In Review*.

32. R. E. Daso, R. Posey, H. Garza, A. Perry, C. Peterson, A.C. Fritz, J. Rivnay, **J. Tropp**, "Standardized Electrochemical Characterization of Conductive Hydrogels" **2025**, *ChemRxiv, In Review.* DOI: 10.26434/chemrxiv-2025-6n1bn.
33. A. Harun, N. Bendele, M. I. Khalil, I. Vasquez, J. Djuanda, R. Posey, G. Christopher, U. Bickel, V. Gruev, **J. Tropp**, P. F. Egan, I. Srivastava, "3D Tumor-Mimicking Phantom Models for Evaluating NIR I/II Nanoparticles in Fluorescence-Guided Surgical Interventions" **2025**, *bioRxiv*, *In Review.* DOI: 10.1101/2025.02.01.636085.

Patents and Patent Applications:

34. **J. Tropp**, J. Rivnay "Conductive Nanomaterials and Composites Thereof" US Patent App. 18/613,535, **2024**.
35. **J. Tropp**, J. D. Azoulay "Methods for Detecting Analytes Using Conjugated Polymers and the Inner Filter Effect" US Patent Serial Number. 11/781,986, **2023**.
36. **J. Tropp**, J. Rivnay, "Acid Crystallized PEDOT Particles and Composites Thereof" US Patent Serial Number. 63/491,753, **2023**.
37. **J. Tropp**, D. Amato, D. Patton, J. D. Azoulay "Thiol Based Post-Modification of Conjugated Polymers" US Patent Serial Number 11,649,320, **2023**.
38. J. D. Azoulay, **J. Tropp**, E. King "Gold Catalyzed Polymerization Reactions of Unsaturated Substrates" US Patent Serial Number. 11/359,049, **2022.**
39. J. D. Azoulay, **J. Tropp**, V. Kaphle, A. R. Benasco, A. Flood, "Macrocycle Embedded Organic Electronic Materials, Composites, and Compositions for Chemical Sensing" US Patent App. 17/519,083, **2022.**

Selected Academic Presentations (Contributed to > 60 Presentations)

1. [Invited Talk] "Standardizing the Characterization of Conductive Hydrogels" *Fundamentals of Organic and Hybrid Mixed Ionic and Electronic Conductors, Telluride Workshop*, Telluride CO, September **2024**.
2. [Invited Talk] "Standardizing the Characterization of Conductive Hydrogels " *IUPAC MACRO 2024, Th 50th World Polymer Congress*, Warwick UK, July **2024**.
3. [Invited Talk] "Conjugated Polymer NIR-II Emitters for Cancer Imaging" *School of Veterinary Medicine HQ*, Amarillo, November **2023**.
4. [Invited Talk] "Enabling Novel Organic Mixed Conductors Through Controlled Synthesis and Processing" *15th International Symposium on Functional-Pi Electron Systems*, Raleigh, June **2023**.
5. [Poster] "PEDOT Nanoparticles: A Tool to Enhance 3D Charge Percolation within Conductive Biomaterials" *15th International Symposium on Functional-Pi Electron Systems*, Raleigh, June **2023**.
6. [Invited Talk] ""Revealing the Impact of Molecular Weight on Mixed Conduction in Glycolated Polythiophenes Through Electrolyte Choice" *American Chemical Society Spring 2023 National Meeting*, Indianapolis, March **2023**.
7. [Invited Talk] "Tailoring Opto(electronic) Chemosensors for Healthcare and the Environment through Precision Conjugated Polymer Synthesis" *Georgia Institute of Technology*, November **2022**.
   Invited by the Student Polymer Network as Winner of the Postdoc Talk Competition
8. [Invited Talk] "Advancing Next-Generation Bioelectronics through Rational OMIEC Design" *2022 AIChE Annual Meeting*, Phoenix, November **2022**.
   Invited to Meet the Faculty and Post-Doc Candidates Poster Session
9. [Invited Talk] "PEDOT-NHS a versatile conjugated polyelectrolyte for bioelectronics" *Rising Stars in Soft and Biological Matter Symposium*, Virtual, October **2022**.
10. [Invited Talk] "Advancing materials design for next-generation bioelectronic applications" *American Chemical Society Fall 2022 National Meeting*, Chicago, August **2022**.
    Invited to PMSE Future Faculty Symposium
11. [Oral] "Functional conjugated polyelectrolytes: Toward the detection of environmental pollutants in seawater" *American Chemical Society Fall 2022 National Meeting*, Chicago, August **2022**.

12. [Poster] “Designing Conjugated Polyelectrolytes for Bioelectronics"
Tosoh Polymer Conference, Hollywood, June **2022**.
13. [Poster] “Molecular Design of Conducting Biomaterial Composites"
American Chemical Society Spring 2022 National Meeting, San Diego, March **2022**.
14. [Oral] “Molecular Design of Conducting Biomaterial Composites"
American Chemical Society Fall 2021 National Meeting, Virtual, August **2021**.
15. [Oral] "Designing Functional Conjugated Materials for Biological Integration"
American Chemical Society Spring 2021 National Meeting, Virtual, April **2021**.
16. [Invited Talk] "Polymer-Based Chemical Sensing Platform for the Identification of Azo Dye Pollutants"
ACS Virtual Postdoc Symposium, Virtual*,* November **2020.**

Research Experience

2020 – 2023 **Postdoctoral research** – *Northwestern University, Evanston, IL*

- Developing electroactive biomaterials to promote tissue regeneration
- Synthesis and characterization of organic mixed ion – electronic conductors for biosensors

2015 – 2020 **Doctoral research** – *University of Southern Mississippi, Hattiesburg, MS*

- Synthesis of conjugated materials for the optical and electronic detection of chemical pollutants
- Synthetic methodology development of conjugated materials for (opto)electronics
- Synthesis and characterization of stimuli-responsive supramolecular polymers

Teaching and Mentoring Experience

Selected Educational/Mentoring Honors and Awards

2025 **Center for Transformative Undergraduate Experiences** – Outstanding Faculty Mentor
2024 **TTU Mortar Board** – Apple Polishing Award
2022 **CIRTL Scholar** – Searle Center for Advancing Learning and Teaching, Northwestern University

Instructor of Record

Fall 2023 **CHEM 5304 Special Topics: Polymer Chemistry,** Texas Tech University
Fall 2024 **CHEM 5304 Special Topics: Polymer Chemistry,** Texas Tech University
Spring 2024 **CHEM 3306 Undergraduate Organic Chemistry II,** Texas Tech University
Summer 2025 **CHEM 3306 Undergraduate Organic Chemistry II,** Texas Tech University
Fall 2025 **CHEM 5304 Special Topics: Polymer Chemistry,** Texas Tech University

Educational Experiences

2023 **President’s STEM Mentoring Academy,** Texas Tech University
2022 **2022 Searle Teaching-As-Research Program,** Northwestern University
2021 **2021 Searle Teaching Certificate Program,** Northwestern University
2021 **An Introduction to Evidence-Based Undergraduates STEM Teaching,** CIRTL

Mentoring – Texas Tech University (13)

- Robert Posey (*Grad. Student at TTU in Chemistry*): **C.B. and Fran Carter Foundation Scholar 2024**
- Brenda Alfaro (*Grad. Student at TTU in Chemistry*): **Richard C. Goodin Endowed Fellowship 2025**
- Nikita Gill (*Grad. Student at TTU in Chemistry*): **1st Place Poster - 2025 Cross-Disciplinary GRC**
- Nicholas Payne (*Grad. Student at TTU in Chemistry*)
- Kazi Mustafa Mahmud (*Grad. Student at TTU in Chemistry*)
- Tahamida Alam Oyshi (*Grad. Student at TTU in Chemistry*): **Distinguished Graduate Student Assistantship**
- Colin Cashman (*Undergraduate at TTU in Chemistry*): **CASURA – College of Arts & Sciences**
- Nicholas Portillo (*Undergraduate at TTU in Chemistry*)
- Kaleb Jewell (*Undergraduate at TTU in Chemical Engineering*): **NIST SURF Fellow 2025**
- Annemarie Fritz (*Undergraduate at TTU in Biochemistry*): **CASURA – College of Arts & Sciences**
- Jacquelyn Tran (*Undergraduate at TTU in Biology*): URS - Honors College, **TrUE Scholar**
- Sophia German-Kavle (*Undergraduate at TTU in Biology*): URS - Honors College

- Helena Garza (*Undergraduate at TTU in Chemistry*): URS - Honors College, 1st Place Poster 2024 SWRM, **Memorial Sloan Kettering Engineering and Imaging Summer Program (EISP) Participant 2025.**

Mentored - Texas Tech University (4)
- Maddox Canham (*High School Student – 2024 Welch Summer Scholars Program*)
- Andrea Perry (*Undergraduate at TTU in Pre-Medicine*): URS - Honors College**, Phi Beta Kappa 2025**
- Boris Salinas (*Undergraduate at TTU in Kinesiology*): URS - Honors College**, Phi Beta Kappa 2025**
- Daniel Fernandez (*Undergraduate at TTU in Chemistry*): URS - Honors College**, Craig Memorial Endowed Scholarship 2025**

Mentored - Northwestern University (4)
- Manideep M. Reddy (*Medical Student at Northwestern University*): **Phi Beta Kappa 2023**
- Shiv Patel (*Medical Student at the University of Florida*)
- Caroline F. Harms (*Undergraduate Student at NU in Materials Science and Engineering*)
- Vidhika Sidda (*Undergraduate Student at NU in Biomedical Engineering*)

Mentored - University of Southern Mississippi (5)
- Erin R. Crater (*Graduate Student at Virginia Tech – Chemistry*): **Barry M. Goldwater Scholar 2019**
- Rimsha Bhatta (*Graduate Student at UIUC – Materials Science and Engineering*)
- Riley Bassetti (*Graduate Student at Brody School of Medicine – Cell Biology and Anatomy*)
- Noel Bell (*Process Engineer at Masonite*): **McNair Scholar 2019**
- Lauren E. Gonce (*Research and Development Chemist at Resinall Corp*)

Academic Service & Outreach

2024 – present	**ACS Science Coaches Program,** Roswell High School – Roswell, NM
2024	**NIH Early Career Reviewer Program**
2023 – present	**Serves as a STEM CORE Member**
2023	**Served as a Junior Mentor for the AIChE Future Faculty Mentoring Program**
2023	**Served as a Judge for AIChE 3MT Competition**
2023	**Polymer Division Meeting at 52nd IUPAC General Assembly**, Virtual Attendee
2022	**CIRTL Round Table**, Invited Panelist – Fall 2022 CIRTL General Meeting
2018 – present	**Journal Reviewer Responsibilities,** *Biomaterials, Chem. Mater., Chem. Rev, J. Am. Chem. Soc*., *JACS Au*, *ACS Appl. Mater. Interfaces*, *ACS Mater. Lett.*, *Adv. Funct. Mater*., *Adv. Mater. Interfaces*, *Adv. Mater*., *Adv. Health. Mater., Adv. Sci*., *Mater. Horiz*., *Nat. Commun*., *Sci. Adv*., *Soft Matter, J. Mater. Chem. C, ACS Macro. Lett., Angew. Chem., Macromolecules, Environ. Sci. Technol.*
2021	**ACS Science Coaches Program,** Streamwood High School – Streamwood, IL
2020	**Expanding your Horizons: Cornell**, Invited Speaker
2018	**Supramolecular Analytical Chemistry** – Organizer and Chair 256th ACS National Meeting, August, Boston MA, USA.
2018	**Served on Screening Committee for Selection of Dean of College of Arts and Sciences** Represented Student Body, The University of Southern Mississippi
2018	**President of Graduate Student Senate** – University of Southern Mississippi
2018	**Judge Region 1: High School Science and Engineering Fair** –Southern Mississippi
2017 – present	**Local K-12 Demonstrations, Tours, and Lectures**, *Brown Elementary School, Legacy Elementary School, 2025 Tech Saavy, 2024 Family STEM Night, Bean Elementary School, 2024 Tech Saavy, 2023 Family STEM Night, Whiteside Elementary School, Streamwood, Purvis, Lanier, Hattiesburg, Sumrall, Laurel, and Hancock High Schools, Homes Community College, Jackson State University, and Longleaf Elementary School*