

2024 ERN Conference in STEM
 Washington, D.C. – March 14-16
 901 Massachusetts Ave NW, Washington, DC 20001
 Undergraduate Oral Presentation Schedule

Oral Presentation Session 1: Friday, March 15 (10:00am – 12:00pm)
 Oral Presentation Session 2: Friday, March 15 (4:00pm – 6:30pm)
 Oral Presentation Session 3: Saturday, March 16 (8:00am – 10:30am)
 Oral Presentation Session 4: Saturday, March 16 (11:00am – 12:30pm)

Session #	Room Location	Author Name	Abstract Title:	Institution	Abstract ID #
1	Chinatown	Kyla Abraham	Developing a Self-Care Robot for Stress Management and Well-Being Using Nao 6 and Machine Learning	Morgan State University	19
1	Chinatown	Michael Adeleke	Design and Implementation of a Virtual Reality-Based Concussion Education System: The Collision Course Approach	Morgan State University	20
1	Chinatown	Jonathan Shields	Analyzing optimization techniques to improve time complexity for recursive algorithms	York College	21
1	Chinatown	Kadiatou Diallo	Drug AI: Accelerating Cancer Treatment with Biomedical Data Science	Lawson State Community College	22
1	Chinatown	Papa K. Manu	Parallel Algorithms for High-Dimensional Clustering	University of Maryland Baltimore County	23
1	Chinatown	Shaimeira Meekins	Unlocking Efficiency and Excellence: VR-Based Training Simulations in Manufacturing	Morgan State University	24
1	Chinatown	Jordan Jones	Mandatory Inspection Point (MIP) Date Consolidation	Texas Southern University	25
1	Chinatown	Yaniel Rivera Vega	Applications of new criteria for absolute irreducibility of multivariate polynomials over finite fields to the conjecture of APN functions.	University of Puerto Rico at Cayey	32

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1	Chinatown	Luis A. Schneegans III	Mathematical Modeling of EGaIn Droplets Sliding Down an Inclined Plane	University of Missouri – St. Louis	33
1	Chinatown	Michael J Ward	Sequences with identical autocorrelation spectra	California State University, Northridge	34
1	Chinatown	Atilia Thomas	Evaluating the Impact of MGrad: A Virtual Mentoring Chatbot for Enhancing Academic Success of African American Computer Science Undergraduates at HBCUs	Virginia State University	60
1	Chinatown	Laci Campbell	Mathematical Modeling to study the growth and the effects of Crude Extract Nectarine on the viability of MCF-7 Breast Cancer Cells	Jarvis Christian University	61
1	Gallery Place	Cherie-Akilah Browne	Gradual exposure to light and dark at the wrong time of the 24 hr cycle negatively impacts circadian behavior more than sudden exposure.	Oakwood University	40
1	Gallery Place	Shanay Desai	EXAMINING THE APOPTOTIC MECHANISM OF PIEZO1 ACTIVATION & TRAIL SENSITIZATION IN GLIOBLASTOMA CELLS	Vanderbilt University	41
1	Gallery Place	Angelis Mary Morales Rivera	The Effect of Anthropogenic Noise on Caribbean Hermit Crab's (<i>Coenobita clypeatus</i>) Behaviors	University of Puerto Rico at Cayey	42
1	Gallery Place	Ricardo Vera-Sánchez	Optimizing a qRT-PCR protocol for <i>H. glaberrima</i> radial nerve cords	University of Puerto Rico – Río Piedras	43
1	L'efant Plaza	Kara Hurdle	Perception of Emotional Prosody in Adults and Adolescents with and without Autism	Molloy University	48

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1	L'efant Plaza	Josephine A. Nyarko	Exploring Foster Care Cases in Georgia with a Removal Reason of Medical Neglect during Covid-19	Clark Atlanta University	49
1	L'efant Plaza	Theodore Wimberly	Examining Psychological and Social Factors that Impact the Experiences and Representation of Black Women in Computer Science (A Case Study)	Morgan State University	50
1	L'efant Plaza	Phinneous Markson	The Best Outcomes- When Everybody Sees "Every Body"	Edgewood College	62
1	Farragut North	Brianna Barbee	USCG INTERSHIP AT THE AIRWORTHINESS SUSTAINMENT BRANCH-2023	Elizabeth City State University	51
1	Farragut North	Lina B-Hernandez	Aperiodic Mechanical Metamaterials	University of California, Merced	52
1	Farragut North	Astrid Daugherty	Rheological Evaluation of a Hydrogel-Based Ovarian Cancer Organoid Model	FAMU-FSU College of Engineering, National High Magnetic Field Laboratory	53
1	Farragut North	Charles Hong	Development of an Intensity-Based Ultrasound Detection for Magnetic Swimmer Tracking	Georgia Institute of Technology	54
1	Farragut North	Ka'Nesha Maggette	Exploration of Salient Professional Identity Development Processes in Second-Year Architecture, Engineering, and Construction (AEC) Women	North Carolina Agricultural and Technical State University	55
1	Farragut North	Demetrius Moore	An Assessment of the Impact of National Association of Home Builders (NAHB) Competition Team Participation	North Carolina A&T State University	56

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			on Residential Career Identity Development in HBCU Competition Team Members		
1	Farragut North	Emmalynne Shumard	Technology Creation for Mapping for Accessible Built Environments	Illinois State University	57
1	Farragut North	Pablo Luna Falcon	Scalable Fabrication Strategy for Self-Assembled 3D Architected Materials	University of Arizona	58
1	Farragut North	Mariana Rodriguez	Alginate bioink concentration causes frequency-dependent alteration in seeded chondrocyte resistance	Georgia Institute of Technology	59
2	Woodley Park	Timia Rae Frierson	Diabetes is associated with Cognitive Dysfunction in young offspring from obese parents	Alabama State University	1
2	Woodley Park	Jihra James	Development of a Novel Microgel Containing CXCL12 and Fas-ligand to Enable Allo-islet Transplantation Without Systemic Immune Suppression for Type 1 Diabetes	Langston University	2
2	Woodley Park	Katelyn King	Quantifying Severity of Vertebral Tail Deformities in a Transgenic Mouse Line	Emory University	3
2	Woodley Park	Kelci Lawrence	Piperine Inhibits Toxoplasma gondii growth	Alabama State University	4
2	Woodley Park	Kevin R. Mercado-Rosado	Antibiotic activity of pigmented microorganisms isolated from the Eleutherodactylus juanariveroi habitat.	University of Puerto Rico- Humacao	5
2	Woodley Park	Arlette Morcelo	A Single Domain of Protein Disulfide Isomerase Efficiently Disassembles Cholera Toxin	University of Central Florida	6

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2	Woodley Park	Aileen Michelle Vela	Microbes in Action: Measuring Expansion Rates and Mechanical Stress on <i>S.cerevisiae</i> Strains	The University of Texas at Austin	7
2	Woodley Park	Wilnijah Chapman	Color/Pattern Polymorphism in Slevin's Bunchgrass Lizard	Virginia State University	8
2	Woodley Park	Laura Arroyo	Short-Lived Zika Virus-Specific Antibodies in Infants: Findings from a Translational Macaque Model	University of Wisconsin Madison	9
2	Woodley Park	Margarita Ramirez	Uncovering Novel Genes Involved in Heat Stress Response in the Unicellular Green Alga, <i>Chlamydomonas reinhardtii</i>	Center for Biotechnology, Fort Valley state University, Fort Valley, GA-31030	10
2	Woodley Park	Aliyyah Roberson	The Effects of a POLQ Deletion in MCM10-Deficient HCT116 Cells	University of Maryland Baltimore County	11
2	Woodley Park	DaMarrion White	Generating Mitotic Clones and Loss-of-Function Midline Mutants in Developing Larval Eye Tissues for Assessment of Decapentaplegic Morphogen Signaling and Proper Tissue Patterning of the Eye	Harris-Stowe State University	12
3	Woodley Park	Shayna Sit	Fluidized Region around a Sphere moving in a Non-Newtonian Liquid	Saint Joseph's University	44
3	Woodley Park	Layla Smith	Electronic Transport Studies of InAs Quantum Well	Norfolk State University	45
3	Woodley Park	Matthew Li	A Feasible Method for Temporal Modulation of Phononic Crystals	University of North Texas	46

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3	Woodley Park	Carlos Romero	Dimensionality Reduction for Classification using Higgs Dataset	Elmhurst University	47
4	Woodley Park	Fatou Dioum	Nanoparticle Synthesis with Biomedical Applications	University of Illinois Chicago	13
4	Woodley Park	Walter Gonzalez Iglesias	Exploring Nanoarchitectures Utilizing Silicon Nanowires, Carbon Nanotubes, and MoS ₂ as Anode Materials for Lithium-ion Batteries	UAGM	14
4	Woodley Park	Victoria Ogbeifun	Protein characterization and crystal structure of yellow thermostable protein (YTP) Q66E E148D	Missouri State University	15
4	Woodley Park	Axel A. Rivera-Ortiz	Effect of TGA-covered Mn-doped ZnS Quantum Dots on Ocimum basilicum plant	University of Puerto Rico at Mayagüez	16
4	Woodley Park	Jexairys Sostre Figueroa	Generation of Fluorescent Fe-doped ZnS Nanoparticles	University of Puerto Rico at Ponce	17
4	Woodley Park	Daniela Marquez Paulin	Development of a Kappa Opioid Receptor Antagonist Using In-Silico Technology	Miami Dade College	18
4	Gallery Place	Rayan Demery	Eco-Physiological Effects of Copper on Sunflower and Corn	Southern University at New Orleans	26
4	L'efant Plaza	Ayodeji Aderin	Gallium Doped Zinc Oxide (GZO) Films for Defroster Applications	Norfolk State University	35
4	L'efant Plaza	Lea Elena Hebert	Plasma Surface Engineering: Revolutionizing Wet Lay Mats for Heavy Metal Remediation from Aerosols	Grambling State University	36

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4	L'efant Plaza	frances lopez	Engineering A Colloidal Gel For Controlled Calcium Release: A Versatile Approach To Develop An Antibacterial Colloidal Gel.	university at buffalo	37
4	L'efant Plaza	Kerianys N. Torres-Torres	Photocatalytic degradation of organic dyes in presence of Ag doped ZnO nanostructures.	University of Puerto Rico in Ponce	38
4	L'efant Plaza	Kwesi Halm	Improving Interfacial Strength in Frontally Cured Composites	University of Maryland, Baltimore County	39
4	Gallery Place	Sonia Durgan	Relating Air Quality Measurements to Cloud Condensation Nuclei Concentrations in Southeast Texas for Aerosol-Cloud Interaction Studies	Texas Southern University	27
4	Gallery Place	Mariana Nicole García-Díaz	Microbiological Contaminants in Recreational Waters of the San Juan Bay Estuary	University of the Sacred Heart	28
4	Gallery Place	Paola N. Rodriguez Montoyo	Fungal infection exposure and respiratory diseases in Guayama, Puerto Rico: A call for prevention	University of Puerto Rico Aguadilla, PR	29
4	Gallery Place	Meilin Scott	Efficacy of Ultrasonic Disinfection in Removing Pathogenic Bacteria From Aquaponic Systems	Western Washington University	30
4	Gallery Place	Haley King	Interferometric Analysis of the Santa Elena Peninsula's Increasing Tectonic Deformation	Texas Southern University	31

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