

HARRIS-STOWE STATE UNIVERSITY & National Science Foundation - HBCU-UP



SPARK THE MIND: ADVANCING THE AGENDA FOR AFRICAN-AMERICANS IN STEM

APRIL 4-5, 2019 | ST. LOUIS, MO.

Harris-Stowe State University | Dr. Dwaun J. Warmack Auditorium | 3026 Laclede Avenue St. Louis, MO 63103

Spark the Mind: Advancing the Agenda for African-Americans in STEM

2019 Program Book

Co-hosted by

Harris-Stowe State University (HSSU)

The National Science Foundation HBCU-UP

HARRIS-STOWE
STATE UNIVERSITY



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About Spark the Mind: Advancing the Agenda for African-Americans in STEM Conference

Greetings and welcome to the Spark the Mind: Advancing the Agenda for African-Americans in STEM Conference. Why Spark the Mind? Simply, as our nation's reliability on science, technology, engineering, and math (STEM) continue to expand rapidly, the economic viability of the U.S. and its communities are heavily dependent on the nation's ability to improve education and degree attainment of all of its citizens. According to the Pew Research Center, United States placed 38 out of 71 countries in test scores in mathematics and 24th in Science tests. It is evident that the education of African-Americans in STEM is critical to our nation's success and its competitiveness on a global stage. STEM impacts all aspects of our daily lives, from the phones we use, the cars we drive, to even the foods that we eat. There is an explosive growth in STEM careers nationally, however, it is estimated that more than two million STEM jobs will go unfilled due to an unprepared workforce.

This conference seeks to examine opportunities to advance the agenda in STEM for African-Americans from a PK-16 continuum—meaning addressing challenges and opportunities at key touchpoints that include, early childhood education, elementary and secondary education, higher education and graduate school education—that leads to successful STEM careers.

Spark the Mind takes a very novel approach in addressing these STEM opportunities by providing voices to individuals on the frontline of African-American STEM advancement and change:

- Elementary, middle school and high school African-American students from various school districts in the region and homeschooled who are in the STEM ecosystem.
- Educators at the PK-12 level who have a vested interest in moving the STEM agenda forward for African-Americans students and have found tremendous STEM success with them.
- Parents who have created innovative and dynamic approaches to providing STEM opportunities for their children and other African-American children.
- African-American STEM Professionals and college students representing higher education and various STEM professions providing expert discussion on experiences, challenges and opportunities.
- Discussion with Program Officers from the National Science Foundation to discuss African-American STEM advancement from a policy and advocacy perspective.

The conference will kick-off with NASA Scientist, Dr. Aprille Ericsson. With a remarkable journey and an extraordinary career, she is guaranteed to inspire. Acknowledging the importance of the Arts in developing critical thinking skills, creativity, discipline and resilience, there will be short performances throughout the conference by African-American artists, entitled, The "A" in STEM. The first "A" in STEM performance will be a pre-conference performance on Thursday, April 4 at 6:00 p.m. with L.I.F.E. Arts, Inc., presenting its critically acclaimed #Complete Gamer, a Tribute to St. Louis Cardinal, Bob Gibson.

A highlight of the conference will be the presentation of the STEM Trailblazer Award to Dr. Claudia Rankins, Program Officer of Historically Black Colleges and Universities Undergraduate Program (HBCU-UP) at the National Science Foundation and Dr. A. James Hicks, Program Officer of the Louis Stokes Alliance for Minority Participation (LSAMP). This will take place on Thursday evening following the panel discussion.

There will be an emphasis on undergraduate STEM scholarship with poster presentations from STEM researchers from both Harris-Stowe State University and Missouri State University. The research posters will be available for viewing on Thursday, and through the noon hour on Friday, April 5. Please support these scholars by stopping by their presentations. The poster presentations will be on the main floor outside the auditorium.

Spark the Mind is very fortunate to have leading regional and national STEM advocates under one conference. The ultimate goal is that you will be inspired, challenged, leaving the conference optimistic and motivated in moving the agenda for Africa-Americans in STEM! Please check out the conference book for times and information on the other STEM participants and sessions.

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About

Harris-Stowe State University (HSSU)

Founded in 1857, Harris-Stowe State University is a historically black public university located in St. Louis, Missouri offering the most affordable bachelor's degree in the state of Missouri. The university is a fully accredited four-year institution with more than 50 majors, minors and certificate programs in education, business and arts and sciences. Harris-Stowe's mission is to provide outstanding educational opportunities for individuals seeking a rich and engaging academic experience. HSSU's programs are designed to nurture intellectual curiosity and build authentic skills that prepare students for leadership roles in a global society.

National Science Foundation (NSF) Historically Black Colleges and Universities - Undergraduate Program (HBCU-UP)

The National Science Foundation (NSF) established the Historically Black Colleges and Universities Undergraduate Program (HBCU-UP) in 2000 to assist HBCUs in their effort to strengthen science, technology, engineering and mathematics (STEM) education and research capacity as a means to broaden participation in the Nation's STEM workforce. HBCU-UP provides awards to develop, implement, and study innovative models and approaches for making dramatic improvements in the preparation and success of underrepresented minority students so that they may participate in STEM graduate programs and the workforce. Support is available for Implementation Projects (including Achieving Competitive Excellence), Broadening Participation Research Projects, Targeted Infusion Projects, Planning Grants, Research Initiation Awards, and other funding opportunities.



OFFICE OF THE PRESIDENT

April 4, 2019

Dear Conference Attendees:



Dr. Dwaun Warmack

On behalf of the Board of Regents, the faculty, staff, and students that make up our historic institution, welcome to Harris-Stowe State University and the Spark the Mind: Advancing the Agenda for African-Americans in STEM conference. We are extremely delighted that you have joined us for this critical discussion on how to get more African-American students in earning STEM degrees and credentials. We understand the impact of moving this needle in making this region and the U.S. more competitive on a global stage in science, technology, engineering, and mathematics.

At Harris-Stowe State University we have been concentrating our efforts in these disciplines and the results have been remarkable. Harris-Stowe has one the largest number of African-Americans enrolled and graduating in the areas of Biological Sciences and Mathematics in the state and has ranked in the top 50 in the nation (out of more than 3,000 institutions) in conferring Mathematics degrees to African-Americans. We provide opportunities for our students by leveraging our institutional strengths. As such, partnerships with St. Louis University Parks College of Engineering allows for students to earn a STEM degree at Harris-Stowe State University and an engineering degree from St. Louis University. Other meaningful partnerships include, Washington University School of Medicine Occupational Therapy graduate partnerships, St. Louis School of Pharmacy, Goldfarb School of Nursing, Southern Illinois University at Carbondale, and Kansas City University of Medicine and Biosciences.

We are grateful for the support from the National Science Foundation, namely two critical programs that advance STEM success at Harris-Stowe State University and the nation—Historically Black Colleges and Universities Undergraduate Program (HBCU-UP) and the Louis Stokes Alliance for Minority Participation (LSAMP). Combined these programs are responsible for graduating thousands upon thousands of African-Americans, Hispanics, Native Americans and Pacific Islanders in achieving STEM credentials. Harris-Stowe is fortunate to have both programs. It is an honor to have both program officers—Dr. Claudia Rankins (HBCU-UP) and Dr. A. James Hicks (LSAMP)—at Spark the Mind and honor both with a STEM Trailblazer Award.

Thank you for your presence!

Sincerely,

A handwritten signature in black ink that reads "Dwaun Warmack".

Dwaun J. Warmack, Ed.D.

President



DIVISION OF ACADEMIC AFFAIRS

Dr. Dwyane Smith

April 4, 2019

To the Spark the Mind Conference Participants:

Welcome to the Spark the Mind Conference! Our team has been working tirelessly for several months to produce a thought-provoking event that will provide an opportunity for participants, panelists and facilitators to develop workable solutions to increase the number of African-Americans with science, technology, engineering, and mathematics (STEM) credentials. It is recognized that it is critical for the competitiveness of the United States on a global stage that African-Americans and other underrepresented groups are credentialed in STEM fields.

At Spark the Mind you will find diverse STEM voices with distinct perspectives; yet the narrative that will be evident throughout the conference is a collective optimistic outlook that the needle can continue to move in advancing African-Americans in STEM.

I want to personally thank the leadership of Harris-Stowe State University, especially Dr. Dwaun J. Warmack, president of our historic institution for his keen vision that supports major STEM activities such as Spark the Mind and other institutional initiatives and the outstanding faculty, staff and students that make up the STEM community at Harris-Stowe State University.

The Spark the Mind Conference is made possible through the support of the National Science Foundation, HBCU-UP Program, Dr. Claudia Rankin, Program Officer—who by the way will be honored along with Dr. A. James Hicks, Program Officer of the National Science Foundation Louis Stokes Alliance for Minority Participation (LSAMP) with the STEM Trailblazer Award at the Spark the Mind Conference.

Please connect and network with each other and most importantly, spark your mind!

Cordially,

A handwritten signature in black ink, appearing to read "Dwyane Smith".

Dr. Dwyane Smith, Provost and
Convener, Spark the Mind Conference

April 4, 2019

Dear Conference Participants:



Dr. Claudia Rankins

On behalf of my colleagues of the Historically Black Colleges and Universities Undergraduate Program (HBCU-UP) at the National Science Foundation, I welcome you to the Spark the Mind: Advancing the Agenda for African-Americans in STEM conference, which is designed to have a conversation around the underrepresentation of African-American students in science, technology, engineering and mathematics (STEM) fields. HBCU-UP is proud to sponsor this groundbreaking event.

Harris-Stowe State University has my gratitude for organizing and hosting this event. Under the leadership of its president, provost, administrators, faculty and staff, the university has become a leader in educating African-American STEM undergraduate students during the last ten years and has had remarkable achievements.

The list of impressive plenary speakers and panelists is an indication that the university recognizes and supports excellence in STEM undergraduate education. At this time in history, it is imperative that we call on the talents of the African-American community to contribute in shaping the future of STEM. This generation of college students is poised to demand that social justice issues need to be part of what defines the sciences and moves the sciences forward.

I wish you a productive and engaging conference.

Sincerely,

A handwritten signature in dark ink that reads "Claudia Rankins". The signature is written in a cursive, flowing style.

Claudia Rankins, Ph.D.

Program Director, HBCU-UP



Dr. Sandra Leal

Dear Attendees,

Welcome to the *Spark the Mind* Conference! It takes a dedicated team of professionals across multiple disciplines in the Department of Mathematics and Natural Sciences (MNS) to inspire and nurture future generations of STEM professionals towards achieving excellence.

With funding from the National Science Foundation HBCU-UP Program, the MNS Department has provided research opportunities to many students and several Harris-Stowe State University graduates from our Department are now enrolled in prestigious doctoral programs at Washington University in St. Louis, the University of Colorado, and Indiana State University.

Memorandums of Understanding (MOUs) have tied students to professional training and degree opportunities in engineering and mathematics at Washington University in St. Louis and St. Louis University while also obtaining a degree at Harris-Stowe State University.

In closing, it is a *great* day to be a Hornet in STEM with an ever-thriving hive of industrious students, adjuncts, full-time faculty, staff, and administrators ready to build the next hive! I am more than ecstatic to be a member of this team! *Spark the mind* and ignite the passion!

Dr. Sandra Leal

Chair of the Department of Mathematics and Natural Sciences
HSSU Site Coordinator for the MOLSAMP Program
Harris-Stowe State University

STATE CAPITOL
201 W. CAPITOL AVENUE, ROOM 216
JEFFERSON CITY, MISSOURI 65101



(573) 751-3222
WWW.GOVERNOR.MO.GOV

Michael L. Parson

GOVERNOR
STATE OF MISSOURI



Governor
Michael L. Parson



Commissioner
Zora Mulligan

Dear Attendees:

It is our pleasure to welcome you to Missouri and to the *Spark the Mind: Advancing the Agenda for African-Americans in STEM* conference. We are confident that you will enjoy your time in St. Louis and at Harris-Stowe State University.

Harris-Stowe has done significant work to identify and implement workable methods to increase the number of African-American students in STEM, and we believe that you will learn much from the university's leaders. Harris-Stowe has outstanding STEM students, nationally recognized STEM faculty, and alumni who have gone on to study in STEM fields at major research universities. The university has also partnered with the National Science Foundation, other higher education institutions, and organizations throughout the St. Louis region on numerous initiatives to increase the number of students who graduate with STEM degrees.

We commend you for leading the discussion on this important subject. STEM jobs are critical to our state's future. The Missouri Economic Research and Information Center has found that 14% of recent help wanted ads were for STEM jobs, including opportunities with employers such as Washington University, Boeing, Deloitte, Centene, and Mastercard. Not only are STEM jobs available – they are good jobs, with the vast majority paying well above the average state wage. STEM workers earn about \$74,000 a year, compared to the Missouri average of \$42,000.

We extend our thanks to Harris-Stowe State University president Dr. Dwaun Warmack and the National Science Foundation for bringing this event to our state and we look forward to learning more about your conversations. Best wishes for a productive event.

Sincerely,

A handwritten signature of Michael L. Parson in black ink.

Michael L. Parson
Governor

A handwritten signature of Zora Mulligan in black ink.

Zora Mulligan
Commissioner of Higher Education



**OFFICE OF THE MAYOR
CITY OF ST. LOUIS
MISSOURI**

**LYDA KREWSON
MAYOR**

**CITY HALL - ROOM 200
1200 MARKET STREET
SAINT LOUIS, MISSOURI 63103-2877
(314) 622-3201
FAX: (314) 622-4061**

April 4, 2019



**Mayor
Lyda Krewson**

STEM Conference
Harris-Stowe State University
St. Louis, Missouri

Dear Honored Guests and Attendees:

On behalf of the City of St. Louis, it is my pleasure to welcome everyone attending this important STEM conference entitled, "Spark the Mind: Advancing the Agenda for African-Americans in STEM." I thank the National Science Foundation for partnering with Harris-Stowe State University to hold this conference in St. Louis.

This conference will provide an opportunity to celebrate the strides that have been made in attracting students to careers in science, technology, engineering and mathematics and to develop workable methods to increase the number of African-Americans in STEM. Harris-Stowe State University is leading the way with its successful collaboration with Saint Louis University Parks College of Engineering, Aviation and Technology.

I extend my best wishes to you for a successful conference.

Sincerely,

A handwritten signature in black ink that reads "Lyda Krewson". The signature is fluid and cursive, with a long horizontal stroke at the end.

Lyda Krewson
Mayor, City of St. Louis

Conference Agenda

Thursday, April 4, 2019

5:00pm - 9pm

Registration for Conference Opens

Henry Givens Jr. Administration Building, Main Level

5:30pm

Auditorium Doors Open

6:00pm

The "A" in STEM Pre-Conference Performance: *L.I.F.E.* Arts under the direction of Brian Owens

6:30pm

Welcome: Dr. Dwyane Smith, *Provost and Vice President of Academic Affairs and Conference Convener, Harris-Stowe-State University*

6:40pm - 7:10pm

Keynote Speaker: The Journey: Dr. Aprille Ericsson, Aerospace Engineer, National and Aeronautics Space Administration (NASA)

7:15pm

Panel 1: STEM Inspiration

Panelists consist of African-American STEM students from various elementary, middle and high schools in the St. Louis region

Panelists:

Kahalia Adams, 11th grade: Parkway North High School

Jada Davis, 11th grade: Cardinal Ritter High school

Jordan Davis, 8th grade: St Louis Catholic Academy

Bryce Davis-Bohon: 5th grade: Homeschool

Saba Fajors, 8th grade: Ladue Middle School

Danielle Kain, 10th grade: Mary Institute and St. Louis Country Day School

Mariah Kain, 7th grade: Jefferson Intermediate School

Adam Lee, 6th grade: Chesterfield Montessori School

David Middleton, 7th grade: Ferguson Middle School

Christian Roberson, 10th grade: Grand Center Arts Academy

Stephion Sutton, 9th grade: Hazelwood East High School

Amyr Taylor, 7th grade: Chaminade College Preparatory

Moderator: Dr. Aprille Ericsson

STEM Trailblazer Awards

Honoring

Dr. A. James Hicks, Program Officer LSAMP, NSF

Dr. Claudia Rankins, Program Officer, HBCU-UP, NSF

8:15pm - 9:30pm

Reception

Dr. Dwaun J. Warmack Conference Center (DJWCC)

Undergraduate Research Poster Presentations

Friday, April 5, 2019

7:00am- 10am

Registration

Dr. Henry Givens Jr. Administration Building, Main Level

Light Breakfast

Dr. Dwaun J. Warmack Conference Center

8:00am

Purpose

Dr. Dwyane Smith, Provost and Vice President of Academic Affairs and Conference Convener, Harris-Stowe-State University

Welcome

Dr. Dwaun Warmack, President, Harris-Stowe State University

8:15am-9:10am

Plenary 1: #HipHopED: Bridging Theory and Practice to Advance STEM

Dr. Christopher Emdin, Associate Professor, Department of Mathematics, Science and Technology, Associate Director of the Institute for Urban and Minority Education, Teachers College, Columbia University

9:10am

The "A" in STEM Performance: Joshua "Paco" Lee: Hip Hop Artist

9:15am- 9:55am

Panel 2: Sparking the Mind: African-American Men in STEM

Panelists:

Dr. Calvin Briggs, Co-Pi and Director of the Pathways into STEM Enrichment Engagement and Empowerment, (Pi STEM E3) Lawson State Community College, Birmingham, AL

Dr. Isaac Butler, Vice President of Diversity and Inclusion St. Louis College of Pharmacy

Dr. Dedric Carter, Associate Provost & Vice Chancellor for Operations and Technology Transfer, Washington University, St. Louis, MO

Dr. Erick Ellis, President/CEO, Sille Education Group, Jackson MS

Mr. Derek McFarland, Junior Biology Student, Harris-Stowe State University

Mr. Kendall Norris, CEO, Global Leadership Forum

Moderator: Dr. Christopher Emdin

9:55am

The "A" in STEM Performance: Ms. Kianna Bower, Singer

10:00am- 10:50am

Plenary 2: National Advocacy and Policy

A Conversation with Dr. A. James Hicks, Program Director, Louis Stokes Alliances for Minority participation (LSAMP) National Science Foundation & Dr. Claudia Rankins, Program Director, HBCU-UP, CREST, CAREER, National Science Foundation

**Moderator: Dr. Dwaun Warmack, President
Harris-Stowe State University**

10:50am

The "A" in STEM Performance: Dr. Robert McNichols, Opera Singer

11:00 a.m. - 11:50

Plenary 3: Sparking the Mind: Where It All Begins

The role of early childhood, elementary and secondary education in the African-American STEM Enterprise

Presentation: Ms. Chantel Mason, STEAM and PBL Teacher, Webster Groves School District

Perspectives from a K-12 Lens:

Dr. Mia Carpenter, Math Coordinator, Normandy Schools Collaborative

Dr. Bruce Green, Assistant Superintendent Hazelwood School District

Dr. Dannielle Davis, Parent & Associate Professor St. Louis University School of Education

Ms. Shay Gillespie, Parent, Founder Color Coded Kids

Ms. Chantell Mason, STEAM and PBL Teacher, Webster Groves School District

Ms. Latonja Slaughter Robinson, Vice Principal, Wooddale High School in Memphis TN,

Moderator: Dr. ClauDean Kizart, Educational Plus, Missouri Model District Coaching Support

12:00pm- 12:50pm

Lunch (DJWCC)

Undergraduate Research Poster Presentations

1:00pm- 1:50pm

Plenary 4: Access to STEM Education; Access to Power

Dr. Kamau Bobb, Senior Director of the Constellations Center for Equity in Computing at Georgia Institute of Technology

1:50pm

The "A" in STEM Performance: Michael Casimir, Violist

2:00pm- 2:50pm

Panel 3: Sparking the Mind: African-American Women in STEM

Panelists:

Ms. Mayla Ayers, Senior Sustainability and Urban Ecology Major,
Harris-Stowe State University

Ms. Cynthia Chapple, Research and Development Chemist, ELANTAS PDG

Dr. Chantel Fuqua, Director, Faculty and Educational Initiatives Diversity Policy
and Programs, Association of American Medical Colleges, Washington, D.C.

Dr. Tracey Hermansteyne, Instructor Washington University
and Research Scientist

Dr. Pavielle Johnson, Chemistry Lecturer at Georgia State University
Perimeter College--Newton Campus

Dr. Danielle Lee, Assistant Professor Department of Biological Sciences,
Southern Illinois University at Edwardsville

Dr. Cheryl Watkins Moore, Director, STEM Entrepreneurial Inclusion
Initiative BioSTL

Moderator: Ms. Carol Daniel, News Anchor, CBS-KMOX Radio

2:50pm

The "A" in STEM Performance: Alicia Sunshine Gbaho,
Dance Performance

3:00pm-3:50pm

Lessons Learned: Takeaway—Audience Discussion
Moderators: Dr. Kamau Bobb & Ms. Carol Daniel

4:00pm-4:30pm

Closing

Spark the Mind: Undergraduate Research Poster Presentations

Mayla Ayers, Senior - Sustainability and Urban Ecology Major, Harris-Stowe State University
(Research Advisor: Drs. Scott Horrell, Ann Podleski and Jana Marcette)

Poster Title: *Using Technology to Build Classroom Community with Underrepresented Time-Stressed Students*

Ramya Beuford, Sophomore - Biology Major, Harris-Stowe State University
(Research Advisors: Drs. Scott Horrell, Ann Podleski and Jana Marcette)

Poster Title: *Making Plans for Success in an Introductory Biology Course*

Reid Chunn, Junior - Math/Engineering Major, Harris-Stowe State University
(Research Advisor Dr. Guy Genin)

Poster Title: *Creating a micro stepping apparatus using Arduino/Matlab for custom testing of biomaterials*

Marshay Davis, Senior - Biology Pre-medicine Major, Harris-Stowe State University
(Research Advisor Dr. David Bogler)

Poster Title: *Observations on Flowers of Nesocodon mauritanus (Campanulaceae), a rare, gecko-pollinated endemic from Mauritius*

Delshawn Fowler, Junior - Biology Major, Harris-Stowe State University
(Research Advisor Dr. Jonathan Fisher)

Poster Title: *Strategies for Treatment or Prevention of Diabetes Using a Chemical that Mimics Exercise*

Anthony Grates, Junior - Wildlife Biology Major, Missouri State University
(Research Advisor Dr. Day B. Ligon)

Poster Title: *Assessing Fertility Patterns in a Captive Breeding Population of Alligator Snapping Turtles (Macrochelys temminckii)*

Ikram Mohamed, Junior - Biology Major, Harris-Stowe State University
(Research Advisor Dr. Laura Schulz)

Poster Title: *A Growth Factor that Influences Placental Health in Mice*

Hillary Smith, Senior - Biology Major, Harris-Stowe State University
(Research Advisor Dr. R.W. Stitch)

Poster Title: *A molecular key of tick species*

Mikal Smith, Junior - Mathematic Major, Harris-Stowe State University
(Research Advisors: Drs. Vasit Sagan and Ann Podleski)

Poster Title: *Base study using G.I.S. to map vacant houses in 4 Missouri Counties (St. Louis Counties, St. Louis City, St. Charles and Jefferson County) over a 40 year.*

Kevin Swanson, Junior - Biology, Harris-Stowe State University
(Research Advisor Dr. Sandra Leal)

Poster Title: *The Role of Midline Patterning the Adult Compound Eye of Drosophila*

Iran Williams, Sophomore - Biology Major Harris-Stowe State University:
(Research Advisor Dr. David Bogler)

Poster Title: *Floral Biology of Thalia Dealbata (Marantaceae)*

Biographies



Kahalia Adams

Student, Parkway North High School

Kahalia Adams attends Parkway North High School and is currently in the 11th grade. Kahalia stated that she is very thankful for this opportunity to be a part of the Spark theMind: Advancing the Agenda for African Americans in STEM conference. She has always had a passion for STEM. Kahalia has competed in several robotics tournaments with the Boys and Girls Club, and she is currently on the coding team. In addition, Kahalia is a Best Buy Teen Tech Center Ambassador in which she teaches middle school students how to code and utilize M.I.T Media Scratch. Kahalia would like to attend Jackson State and major in computer science. Her dream job is to work for NASA as a data analyst.



Mayla Ayers

Senior Sustainability and Urban Ecology Major, Harris-Stowe State University

Mayla Ayers is a graduating senior Sustainability and Urban Ecology major at Harris-Stowe State University. She is in the inaugural cohort of Harris-Stowe's Honors College and a student representative of the Missouri Louis Stokes Alliance for Minority Participation (MoLSAMP). Mayla has been involved with Harris-Stowe's Minority Science and Engineering Improvement Program (MSEIP) where she conducted research with neighboring elementary schools to inspire environmental awareness. As an undergraduate student, she has also conducted research in both social justice studies and urban agriculture initiatives. Mayla has interned at the competitive Donald Danforth Plant

Science Center REU program for the summer of 2017. There, she and her colleagues studied plant physiology and gene analysis to encourage resilience of plant matter facing extreme climate change. In spring 2018, she won first place with her oral presentation in the Ecology and Environmental/Earth Sciences category at the Emerging Researchers National (ERN) conference. After graduation, Mayla will study in the Geographic Information Science M.S. program at Saint Louis University and is a recipient of the Diversity Graduate School Fellowship.



Kamau Bobb

Senior Director of the Constellations Center for Equity in Computing at Georgia Institute of Technology

Dr. Kamau Bobb is an authority in the national effort to achieve equity in the STEM education landscape. Dr. Bobb was a Program Officer at the National Science Foundation (NSF) in the Directorate for Computer & Information Science & Engineering. He helped to shape the national research agenda for effective means of delivering quality computational education to all students. At NSF he was responsible for \$30 million annually of investments targeted at improving computing and STEM education. In that capacity he served on President Obama's My Brother's Keeper STEM + Entrepreneurship Taskforce. Prior to his current assignment, Dr. Bobb was the director of the STEM Initiative for the University System of Georgia, a collaborative effort with the governor's office to improve STEM education across the 30 public institutions serving approximately 325,000 students in the state. His national and state leadership have contributed to a STEM education agenda that is more reflective of social and cultural realities. Prior to his work in Georgia, Dr. Bobb was a technology policy analyst at SRI International where he conducted research on university strategic planning and STEM workforce analysis for clients in the United States and the Middle East.

Dr. Bobb brings to his work a passion to ensure that all students, particularly students of color, have access to seats of power in the technology sector that is shaping contemporary American life. His writing on STEM education and culture has been featured in *The Atlantic*, *Black Enterprise*, *The Root*, *Edutopia* and on the Obama White House Blog. Dr. Bobb holds a Ph.D. in Science and Technology Policy from Georgia Tech and M.S. and B.S. degrees in Mechanical Engineering from the University of California, Berkeley.



Kianna Bower

Singer

Kianna Bower is a sophomore Early Childhood Education major from St. Louis, MO. A product of the St. Louis Public Schools she graduated from Central Visual and Performing Arts High School. Singing from the age of two, she has performed in a variety of venues, including the stage of the St. Louis Fox Theatre. She cites her influences as the Jazz greats—Nina Simone, Ella Fitzgerald, Billie Holiday and Sarah Vaughn. Ms. Bower goals include become an early childhood educator and a traveling musical performer.



Calvin Briggs

Founder/Director, Center of Excellence in STEM and teaches mathematics at Lawson State Community College (LSCC)

Dr. Calvin Briggs is the Founder/Director of the Center of Excellence in STEM and teaches mathematics at Lawson State Community College (LSCC) in Birmingham, AL. In this role he directs STEM grants: Pathways into STEM Engagement, Enrichment, Empowerment (Pi STEM E3) and the Georgia-Alabama Louis Stokes Alliance for Minority Participation (GA-AL LSAMP) programs; two examples of more than \$7.0 million in STEM grant funding from the National Science Foundation. Dr. Briggs develops, implements and evaluates programs and activities to increase the number of underrepresented minorities entering and persisting in STEM career paths. Dr. Briggs advocates for impactful STEM policy and broadly disseminates “Best Practices” in STEM student recruitment, retention, success and leadership via the Alabama Governor’s Advisory Council for Excellence in STEM (ACES), Alabama Mathematics Science and Technology Coalition, the Understanding Interventions Advisory Board, and the Alabama Mathematics Course of Study Committee.

Dr. Briggs received his Associate of Arts degree from Brookdale Community College in Lincroft, NJ; a Bachelor of Arts degree in Art from Clark Atlanta University in Atlanta, GA; his Masters degree in Mathematics Education; and a Doctorate of Education degree in Educational Leadership, Policy and Law from Alabama State University in Montgomery, AL. His research explores self-efficacy, identity, and achievement in mathematics among African American males.



Isaac Butler

Vice President of Diversity and Inclusion St. Louis College of Pharmacy

Dr. Isaac Butler was appointed Vice President of Diversity and Inclusion at St. Louis College of Pharmacy (STLCOP). At the College, he engages in partnerships that promote learning, equity and community development. In addition to these responsibilities, he provides collaborative leadership for the curriculum, training programs and initiatives on cultural competency; and providing leadership in fostering a campus climate that respects and values diversity and inclusion. Dr. Butler has more than 14 years of experience in assisting individuals and organizations achieve desired results. Prior to STLCOP he had several roles at Express Scripts, including Director of Clinical Program Management and Senior Director in Retail Pharmacy Provider Strategy. He is the Founder of Think.Dream. Lead a LLC. He serves of the Board on the Barnes Jewish Hospital Foundation and is Co-Founder & Co-Director of the BEST Pharmacy Summer Institute. Dr. Butler earned his B.S. degree in Chemistry from the University of Missouri, Columbia, his MBA from the University of Missouri, St. Louis and a Doctorate in Pharmacy from the University of Missouri, Kansas City.

**Mia Carpenter**

Math Curriculum Coordinator, Normandy Schools Collaborative

Dr. Mia Carpenter is entering her 15th year in public education serving eight of those years as a classroom teacher of math and science. During her second year teaching, Dr. Carpenter was recognized as Teacher of The Year in Cumberland County Schools located in Fayetteville, North Carolina. Dr. Carpenter currently serves as the Math Curriculum Coordinator at Normandy Schools Collaborative, adjunct professor in the College of Education at Harris Stowe State University, and Founder/Administrator of STEM Saturdays in St. Louis, Mo.

She earned a Bachelor's degree in Elementary Education and Master's degree in Middle Grades Mathematics from Fayetteville State University where she became a proud member of Delta Sigma Theta Sorority. She continued her studies by earning her doctorate in Curriculum and Instruction with an emphasis on mathematics in urban education at St. Louis University in St. Louis, MO.

Dr. Carpenter is greatly respected for her creative approach to professional development and diligently developing teachers that can effectively use STEM-based activities for learning.

**Dedric A. Carter**

Associate Provost and Associate Vice Chancellor for Innovation and Entrepreneurship, Washington University in St. Louis

Dr. Dedric A. Carter is Associate Provost and Associate Vice Chancellor for Innovation and Entrepreneurship at Washington University in St. Louis. In this role, Dr. Carter serves as the executive officer for innovation and entrepreneurship has oversight for the Office of Technology Management, the Center for Research Innovation, and the Skandalaris Center for Entrepreneurial Studies in addition to responsibility for the campus interactions and programming with the Cortex Innovation District. Dr. Carter teaches courses in systems applications to technical, business, and policy issues.

Prior to joining Washington University in 2013, he served as the Senior Advisor for Strategic Initiatives in the Office of the Director at the National Science Foundation in addition to serving as the Executive Secretary to the US National Science Board executive committee in Arlington, VA. Dr. Carter launched and oversaw the NSF Innovation Corps (I-Corps) program to impact the speed of basic research commercialization. He has been an Assistant Dean of Engineering at MIT and a principal consultant in IT strategy and management.

He studied as a Senior Executive Fellow at the Harvard Kennedy School of Government. He is a board member of the Midwest Research Universities Network, the Academy of Applied Sciences, the MIT Federal Credit Union, and the Dana Farber CURE Program. Dr. Carter is a former trustee of MIT and the UVA School of Engineering and Applied Sciences where he served as vice-chair of the Academics Board. Dr. Carter and his wife Dr. Ebony B. Carter, a physician and maternal fetal medicine fellow have two children.

**Michael Casimir**

Violist, St. Louis Symphony

Michael Casimir was a winner of the Laureate Award in the 2015, 2011, and 2008 International Sphinx Competitions, and winner of the grand prize at the Hudson Valley Philharmonic Competition in 2013. He has guested as Principal, and Co-Principal of the London Philharmonic, and is one of the newest members of the viola section in the St. Louis Symphony. While still at Curtis Michael performed regularly with the New York Philharmonic, Philadelphia Orchestra, and Orpheus Chamber Orchestra. Michael just acquired his post-baccalaureate degree from The Curtis Institute of Music in May 2018 where he was a student of Roberto Diaz, Hsin-Yun Huang, and Ed Gazouleas. He is a graduate of The Juilliard School.

**Cynthia Chapple**

Research and Development Chemist, ELANTAS PDG

Cynthia Chapple is a Research and Development Chemist at ELANTAS PDG. She is the lead developer of innovation in the area of protective coating technology for the electrical and electronic markets. She is also the Founder and Managing Director for Black Girls Do STEM, a program with the mission to trigger an increased curiosity through deliberate education, access and opportunity in Science, Technology, Engineering, and Mathematics in the minds of every black girl. This is achieved through rigorous hands-on STEM workshops and empowering mentorship that exposes black girls to black women in STEM. Originally from Chicago IL, Chapple earned her B.S. degree in Forensic and Investigative Science; and a BA, Chemistry. She earned her M.S. degree in Chemistry from Southern Illinois University at Edwardsville. She is a member of the American Chemical Society, Focus STL Coro Women in STEM Leadership a working group member of the STEMSTL Ecosystem

**Carol Daniel**

News Anchor, CBS-KMOX Radio

Carol began her career at the “Voice of St. Louis” in 1995 as an anchor, reporter and talk show host. She was hired when the program director at the time was driving to Memphis, and heard Carol on the air at a radio station in Cape Girardeau, Mo. Two weeks later, she moved to St. Louis and was working at KMOX.

Carol helped launch the Emmy-winning television talk show, “Great Day St. Louis,” where she was a cohost for four years. She is also an award-winning columnist — she was honored twice with a National Newspaper Association award for her column, “Carol’s Journal,” which ran for nearly 10 years in the St. Louis American Newspaper. In 2014, Carol published her first book, “All I Ever Wanted: Relationships, Marriage, Family.” A children’s book is in the works.

Carol has been honored for her work by the Missouri Broadcasters Association, St. Louis Association of Black Journalists, Delta Sigma Theta Sorority, the Monsanto YWCA, and she is a member of the YWCA Women’s Leader Class of 2005. Carol has also received the Dr. Martin Luther King Jr. State Celebration Commission’s Distinguished Local Media award. She and her Husband Patrick Daniel, Sr. are the parents of two sons, Patrick Daniel Jr. and Marcus Isiah Daniel.

**Bryce Davis-Bohon**

Student, Homeschooled

Bryce Davis-Bohon is a 10 year old homeschooled 5th grader. Bryce Davis-Bohon is a Circle of Excellence STEM team member and he serves the community through his emerging non-profit, Tut Tutoring, where he has donated hundreds of books to community centers and individual children in the St. Louis area. Bryce is an award winning photographer, and with his team placed 1st place in the recent Academy of Science St. Louis Science Fair. He has served as an Assistant Robotics Coach for The Circle of Excellence, who went on to win the regional “Best Project Award ” with First Robotics. Bryce has traveled internationally to present his experiences with The Circle of Excellence. His favorite subjects are reading, science, and math.



Dannielle Joy Davis, Ph.D.

Associate Professor of Higher Education Saint Louis University

Dr. Dannielle Joy Davis is a tenured Associate Professor of Higher Education at Saint Louis University. She is the first known African American woman to earn tenure in the history of the institution's School of Education. A graduate of the University of Illinois at Urbana-Champaign, her interdisciplinary research examines the experiences of marginalized groups in educational settings and the role of organizational policy and practice in the promotion or inhibition of egalitarian academic and occupational outcomes. She has published over 65 refereed journal articles, book chapters, volumes, academic commentaries, and reviews. She is Co-Editor and a Contributing Author of the books: *Black Women in Leadership: Their Historical and Contemporary Contributions* (Peter Lang Publishing), *Social Justice Issues and Race in the College Classroom: Learning From Different Voices* (Emerald Group Publishing Ltd.), *Intersectionality in Education Research* (Stylus Publishing), *Specialists: Passions and Careers* (Universitas Press), and *Motherhood in Precarious Times* (Demeter Press). Dr. Davis is Founder and Director of the community program, The Circle of Excellence STEM Academy and Co-founder of the Black Enrichment and Homeschool Network, where she offers STEM field trips and resources to over 200 Black homeschooling families in St. Louis.



Jada Davis

Student, Cardinal Ritter High School

Jada Davis attends Cardinal Ritter High school and is currently in the 11th grade. She is very excited about being a part of the STEM Conference. Jada has participated in robotics and coding during after school programming while attending St. Louis the King. In addition, Jada attended the 2016 Clavius Project STEM event held at St. Louis University High School representing St. Louis the King. While attending the event, she was able to display and demonstrate the video game that she programmed. Jada would like to study mortuary science and become a Doctor.

**Jordan Davis**

Student, St. Louis Catholic Academy

Jordan Davis attends the St Louis Catholic Academy and she is currently in the 8th grade. Jordan has participated in robotics, and coding during after school programming. While attending St. Louis the King, she created and programed a Robot at the event's STEM session. Jordan has also been involved with her middle school's family STEM night. During the family STEM night, Jordan helped set up each Tech station, and she helped her classmates create small projects, such as making soda bottles into rockets and building a tower with straws and tape. When Jordan grows up, she would like to be an Engineer and work for NASA.

**Erick D. Ellis**

President of Sille Education Group

Dr. Erick D. Ellis has been the President of Sille Education Group (SEG) since 2014. Sille Education Group is a 501©3 nonprofit organization led by Integrity, Respect, and the Pursuit of Excellence. Its purpose is to serve all communities, institutions, and municipalities. SEG's passion is education. It works with Pre-K-12, colleges and universities, continuing adult education, vocational and technical education institutions. Understanding the importance of developing minds, SEG provides opportunities for meaningful educational initiatives.

Dr. Ellis received his B.S. (Chemistry), M.S. (Organic Chemistry), and PhD. (Organic Chemistry) at Jackson State University located in Jackson, MS. His area of expertise is Synthetic Organic Chemistry with over 14 years of teaching Chemistry, conducting research, and working as a lab manager in a instrumentation laboratory. He has worked at Alabama A & M University, Michigan State University, Washington University in Saint Louis, and Jackson State University, and etc. As an educator and chemist, Dr. Ellis is passionate in teaching students the knowledge and skills preparing them for academic success and the importance of STEM.

**Christopher Emdin**

Associate Professor Department of Mathematics, Science and Technology at Teachers College, Columbia University

Dr. Christopher Emdin is an Associate Professor in the Department of Mathematics, Science and Technology at Teachers College, Columbia University; where he also serves as Director of the Science Education program and Associate Director of the Institute for Urban and Minority Education.

He is an alumni fellow at the Hutchins Center at Harvard University and served as STEAM Ambassador for the U.S. Department of State and Minorities in Energy Ambassador for the U.S. Department of Energy.

Dr. Emdin is a social critic, public intellectual and science advocate whose commentary on issues of race, culture, inequality and education have appeared in dozens of influential periodicals including the New York Times, Wall Street Journal, and Washington Post.

Dr. Emdin holds a Ph.D in Urban Education with a concentration in Mathematics, Science, and Technology; Masters degrees in both Natural Sciences and Education Administration, and Bachelors degrees in Physical Anthropology, Biology, and Chemistry.

He is the creator of the #HipHopEd social media movement, and a much sought-after public speaker on a number of topics that include hip-hop education, STEM education, politics, race, class, diversity, and youth empowerment. He is also an advisor to numerous international organizations, school districts, and schools.

He is the author of the award winning book, Urban Science Education for the Hip-hop Generation and the New York Times bestseller For White Folks Who Teach In the Hood and the Rest of Ya'll too.



Dr. Aprille Joy Ericsson

Aerospace Engineer, National and Space Administration (NASA)

In her lofty career as an aerospace engineer and instrument manager at NASA's prestigious Goddard Space Flight Center, Dr. Aprille Joy Ericsson has played a key role in designing spacecraft and instruments that contribute to our greater understanding of the Sun-Earth connection, space science and Earth itself. But her inspiration to pursue a life of science and engineering began as a youngster while viewing milestone NASA spacecraft launches on TV as well as participating in unforgettable science outreach experiences as a student.

Says Aprille: "There were several instances that fostered my interest during childhood: The first was watching the Apollo missions on TV in school in first grade; the second was me winning second place in the 8th grade science fair where I built my first science instrument, and third, attending the MIT UNITE science outreach program for minority students (now called Minority Introduction to Engineering & Science, or MITES) which I participated in during the summer of my junior year in high school."

During the latter program, part of which took place at an Air Force Base in New Hampshire, she was able to sit in the aircraft control tower and fly in a flight simulator, even receiving a pilot's score. "This experience really led me to my decision to explore the aerospace field," she says.

Such episodes also motivated her in other trailblazing career achievements, including becoming the first African American female to receive a Ph.D. in Mechanical Engineering from Howard University (Washington, DC), and the first African American female at NASA's Goddard Space Flight Center to receive a Ph.D. in Engineering.

Aprille, who currently serves as the Goddard Space Flight Center's Program Manager for Small Business Innovative Research and Small Business Technology Transfer Research, is equally known today for her work to motivate other minority students in science and engineering. "Generally, I would say I am proof that one can achieve your career goals with meager resources," she says. "But to make STEM fields more diverse and inclusive of all students, we need to check our biases at the door in order to be open to people who are different from us, or who think differently from us."

Graduating from high school with honors, Aprille entered college at Massachusetts Institute of Technology (MIT) where she earned a Bachelor's of Science degree in Aeronautical/Astronautical Engineering. While an undergraduate student there, she became actively involved in key aerospace projects through the institute, which would further shape and mold her career.

She would go on to spearhead, or play an important role in, other multi-million dollar space initiatives such as NASA's Tropical Rain Measuring Mission which helped observe the effects of weather cycles known as El Niño and La Niña in order to correlate their activity with crop productivity. Her other projects have included: the Wilkerson Microwave Anisotropy Probe and the Lunar Reconnaissance Orbiter (two of the "coolest" spacecraft for which she says she had the opportunity to design instrumentation), and the ICESat-2 Atlas (Ice, Cloud, & Land Elevation Satellite) — a \$450 million

laser altimeter instrument, which is expected to launch in 2016, that will provide measurements over the ice sheets of Greenland and Antarctica to quantify changes in ice-sheet mass that impact global sea level.

For her work and achievements, she has received numerous honors, including: Howard University's College of Engineering, Architecture, & Computer Science Alumni Excellence Award; NASA's Exceptional Achievement in Outreach Award, and the President's Medal from York College.

**Saba Fajors**

Student, Ladue Middle School

Saba Fajors is an 8th grader at Ladue Middle School. Over the last two years she has participated in two STEM Summer camps at the Challenger Learning Center, and a robotics class at Time Machine. In 2018 she won the America's Cup Judo tournament and placed 2nd in the 200 meters at the Sunflower State Games. When Saba grows up, she would like to be an Engineer or a Doctor.

**Chantel Fuqua**

Director of Faculty and Education Initiatives, American Association of Medical Colleges

Dr. Fuqua is the Director of Faculty and Education Initiatives at the American Association of Medical Colleges, developing new programs to promote faculty diversity. Previously, she served as a 2016-2018 AAAS Science and Technology Policy Fellow in the Division of Human Resource Development in the National Science Foundation's Directorate for Education and Human Resources, supporting the Louis Stokes Alliance for Minority Participation program.

Dr. Fuqua is trained as a biochemist with specialties in cancer biology, chemistry, and immunology. She has experience providing scientific and technical support to the National Science Foundation, National Institute of Neurological Disorders and Stroke (NINDS), National Cancer Institute (NCI), and National Institute for Allergy and Infectious Disease (NIAID) at the National Institutes of Health (NIH), along with the U.S. Army Medical Research and Materiel Command (USAMRMC) in the management of the Congressionally Directed Medical Research Programs (CDMRP) and other scientific programs. She has a strong interest in broadening participation in STEM disciplines and educational policy. Her recent prior research investigated the work-life balance policies for faculty at historical black college and universities through extensive scientific literature reviews, focus groups and workshops. This work supports the development of a matrix for future use by academic institutions to maximize faculty productivity and success. Dr. Fuqua has also taught biology, biochemistry, and chemistry at various types of higher education institutions, and is currently an Adjunct Assistant Professor of biology at the University of Maryland University College. Dr. Fuqua earned her B.S. degree in Chemistry from St. Louis University and a Ph.D. in Biomedical Sciences from Meharry Medical College in Nashville, TN.



Alicia Sunshine Gbaho

Artistic Director & Founder of Beyond Measure Dance Theater
The AfroKuumba Dancers

Alicia “Sunshine” Gbaho professional career of dance has come with great vigor! She has studied and performed dance since her young years at the Katherine Dunham Center in East St. Louis, IL. She later continued her professional study at Illinois State University while becoming a company member of Illinois State Dance Theater and the Competitive Dance Troupe: NOIR. This allowed her to work with many notable choreographers in Dance Theater and Commercialism. It was there that the bulk of her technical dance training was grounded in an array of dance techniques. Her advanced performance career, locally & nationally, has allowed her to move forward with that purpose. Notable performances include but are not limited to: Lupe Fiasco (Grammy Nominated Hip Hop Artist), Universal Soul Circus, Afriky Lolo (Assistant Artistic Director), The Slaughter Project, Banyan Dance Theater, JPEK Creative Works, Nu-World Contemporary Dance Theater, The Legendary Showtime at the Apollo, R&B Sensation Jznalle and SOSy.

Alicia Sunshine is also a passionate entrepreneur that has led to her the creation and development of Beyond Measure, LLC. Beyond Measure, LLC is a 3 tier company consisting of Beyond Measure Dance Theater, Afroetics & The AforKuumba Dancers. It’s mission is to educate, entertain and inspire audiences of all ages on the history, culture and music of the African/African American community through the use of influential & popular dances of the African diaspora.

“If you want to know more about whom my daughter is, it’s in her dance.”
Catherine D. Williams.



Shay L. Gillespie, M.A.
Founder, Color Coded Kids

There's an adage that says, a mother will make a way when it comes to her children. That adage rings true for Shay Gillespie, founder of Color Coded Kids. The seed was planted because of her oldest son, Grant's love for computer programming. After countless, unsuccessful attempts to find a program in North County, St. Louis, Shay began the long trek to west county for a program fitted for her son. Those long drives eventually turned into hours of thinking about how she could bring a similar program to North County. After soliciting feedback from her Facebook friends, she realized there were a number of parents in a similar situation. After talking to a mentor at her full time job, she launched a website within two days, complete with registration information. Taking funds from her personal savings account, Shay purchased 10 laptops and transformed her basement into a classroom. Shay wanted her program to be different and the best! Because of her background in technology and her extensive network in the technology sector, Shay petitioned industry-leading developers to be instructors. She wanted the kids to learn firsthand knowledge about industry trends and gain experiences vital for future career opportunities. The classes began in October of 2016 with a total of 16 students enrolled in two classes, two nights a week. Within 6 months, CCK had instructed more than 125 students in the North County area. In February of 2017, CCK partnered with the Microsoft store in the St. Louis Galleria to reach students in other St. Louis areas. Also, in February of that same year, CCK partnered with the Boy Scouts of America to offer boy scouts the opportunity to earn their programming merit badge using CCK's curriculum. In August 2017, Shay founded Color Coded Kids Foundation to provide scholarship to students with financial needs which has provided more than 20 scholarships to students across the US. Today, CCK has launched in 6 other major cities including Atlanta, Charlotte, Dallas, Houston, Arlington and New York. CCK also has had several partnerships with major entities including Mastercard, The Urban League, Girl Scouts of America, Boy Scouts of America and St. Louis Internship Program.

Shay continues to work for World Wide Technology, a multi-billion-dollar technology firm headquartered in St. Louis, where she works with new and existing, large enterprise customers to find strategic ways to partner. She attributes much of her initial success to David Steward, Founder and Chairman of World Wide Technology. Mr. Steward has been a mentor for more than 14 years helping her understand her true potential for success.

Shay is also a proud board member of the Down Syndrome Association of Greater St. Louis. She joined in 2015 to be closer to resources and information to help her other son, Diggy, have the best life possible after he was diagnosed with Down syndrome when he was six months old. Shay is also a proud member of the Illustrious Delta Sigma Theta Sorority Incorporated.

Shay has received several awards from organizations in the St. Louis community including the Made Mogul Black Tie Community Award, St. Louis American's Salute to Young Leaders Award, Power 100 Award presented by Delux Magazine, Who's Who in Diversity St. Louis and the Phenomenal Woman Award presented by First Bank. In April of 2017, Shay was featured on the cover of Delux Magazine as one of their featured "50 Most Intriguing Women" Edition.

Shay received her Bachelor of Arts in Organizational Studies from Saint Louis University and her Master of Arts in Communications from Webster University.

A native of St. Louis, Shay wakes up at 430am EVERY morning to workout. She lives in St. Louis county with her husband James and two boys, Grant and Dylan (Diggy).

**Bruce Green**

Assistant Superintendent, Hazelwood School District

Dr. Bruce Green has been an assistant superintendent for the Hazelwood School District since 2015. In his role, he serves as a leadership cabinet member where he oversees the district's three high schools, technology, state-level data analysis and reporting, alternative education, and school safety. He has more than 18 years of educational experience working in various roles with increased levels of responsibility.

Dr. Green earned a doctorate in educational leadership from Maryville University. He has a master's degree in education administration from the University of Missouri-St. Louis. He graduated Summa Cum Laude with a Bachelor of Science degree in secondary education with a math option from Harris-Stowe State College.

His personality has aided his ability to successfully attract, guide and motivate students and staff to reach their highest potential. In so doing, Dr. Green has been and continues to be recognized for his accomplishments. Some of his accomplishments include a Ronald McNair Scholar, William L. Clay Scholar and Pathways Teacher Scholar. In 2016, Harris Stowe State University presented Dr. Green with its "Distinguished Alumna Award."

Dr. Green recognizes and understands that he has stood on the shoulders of giants and without his mentor, Dr. Alice F. Roach, he would not be the educator this he has become. Dr. Green and his wife, Tracy, have been married for 20 years and are the proud parents of four children (Brashonda, Mary, Bruce and Terrell).

**Tracey O. Hermanstytne**

Instructor in the Department of Developmental Biology at Washington University, St. Louis School of Medicine

Dr. Tracey O. Hermanstytne is an Instructor in the Department of Developmental Biology at Washington University, St. Louis School of Medicine where she studies the molecular and cellular mechanisms that underlie the functioning of the brain's clock which controls circadian rhythms in physiology and behavior. She utilizes behavioral assays and molecular genetic strategies with electrophysiology, to continue to gain more insight into how the brain's clock functions and to identify novel targets for drug development. Dr. Hermanstytne also serves as the Co-Director for the Initiative to Maximize Student Development (IMSD) Program which is an NIH funded program that seeks to promote the recruitment, retention, and graduation of students from under-represented groups in PhD programs in the Division of Biology and Biomedical Sciences at Washington University. She has authored several peer-reviewed research articles, presented at national and international conferences, won numerous awards and fellowships for her research as an Ion channel biologist from organizations such as the Society of Neuroscience, the Federation of American Societies for Experimental Biology and United Negro College Fund.

Dr. Hermanstytne is a member of the Gamma Omega Chapter of Alpha Kappa Alpha Sorority, Incorporated. She has received her bachelor's degree (BS) in biology from Howard University in Washington, D.C. and a doctorate degree (Ph.D.) in neuroscience from the University of Maryland, Baltimore School of Medicine.



A. James Hicks

Program Director, Louis Stokes Alliances for Minority Participation (LSAMP),
National Science Foundation

Dr. A. James Hicks, Program Director, Louis Stokes Alliances for Minority Participation (LSAMP), National Science Foundation (NSF), Arlington, VA received his B.S. degree in biology from Tougaloo College, earned the Ph.D. in Botany at the University of Illinois-Urbana and received postdoctoral training, at the Missouri Botanical Garden, St. Louis. He acquired administrative training by attending the Institute for Educational Management for College and University Administrators, Harvard University, Cambridge, MA; the Executive Development Seminar for Senior Federal employees at the Western Management Development Center, Denver CO; the Extramural Associates Program at the National Institutes of Health in Bethesda, MD; the Lilly Foundation's Liberal Arts Program for College Administrators in Colorado, Springs, CO; and the Christian A. Johnson Foundation's Leadership Program in New York City.

Prior to becoming the LSAMP Program Director, Dr. Hicks served as Chairperson and Professor of Biology from 1977 to 1988, and later Dean of the College of Arts and Sciences from 1988 to 1997 at North Carolina A&T. Under his leadership the research capacity of the Department of Biology was enhanced by the acquisition of major research grants and equipment including two electron microscopes, along with renovations of the facilities to include more research space. As a scientist his research focus has been in the area of plant systematics and he has reported his work at various scientific seminars and in peer review journals. While serving as Dean, major renovations for Physics (Fort Research Building), Chemistry (Hines Hall), and Fine Arts (Crosby Theatre Complex, and Dudley) buildings were completed and plans for a \$34 million dollar General Classroom Building were approved. The construction of the latter building was completed and occupied in the fall of 2003.

Dr. Hicks is well known at the local, state and national levels for his service on numerous committees and advisory boards. In North Carolina he served on the Greensboro Bog Garden Advisory Board, the Plant Conservation Board (NCPCB); the Guilford County Advisory Board for Environmental Quality; the Natural Areas Advisory Committee of the Department of Natural Resources and Community Development; and the Biotechnology Center (NCBC), Facilities and Infrastructure Review Committee, Research Triangle Park. On the national level he was an elected official on the Board of Trustees of the Lady Bird Johnson Wildflower Research Center, headquarters in Austin, Texas; a member of the Task Force on the National Agenda for the Council of Colleges of Arts and Sciences (CCAS), headquarters at Ohio State University, Columbus Ohio; and a Diversity Advisory Committee (DAC) Member, Keystone Symposia on Molecular and Cellular Biology – 2015-2020.

Also, at the national level, Dr. Hicks has served on several panels of proposal evaluators for the National Academy of Sciences, Washington, D.C; American Association for the Advancement of Science's (AAAS) Post-doctoral Fellowship Panel, Washington, DC; the Directorate for Science and Engineering Education/NSF, Atlanta, GA; the Department of Education/Minority Institutions Science Improvement Program (MISIP), Washington, D.C; the NSF Minority Graduate Fellowship Program, and NSF's Research Apprenticeship for Minority High School Students Program. In 1995, he was a member of the North Carolina delegation to Baden-Wurttemberg, Germany, which negotiated a Memorandum of Understanding allowing student and faculty exchanges between North Carolina and Germany. In 2006, Hicks was a guest, keynote speaker at the University of Auckland, the Maori Research Center, New Zealand, and Sydney University, Sydney, Australia. And, in 2009, 2012, and 2015 Hicks conducted an administrative visit to the Organization of Tropical Studies Field Stations in Costa Rica. LSAMP Native American and Pacific Islander students conduct tropical research at the stations.

Dr. Hicks and his wife Mrs. Pearl are the proud parents of two daughters Dr. Roselyn M. Hicks, and Ms. Renee Hicks, and a granddaughter, Sasha.



PaviElle M. Johnson, Ph.D.

Chemistry Lecturer, Georgia State University Perimeter College

Dr. PaviElle (Lockhart) Johnson is a Chemistry Lecturer at Georgia State University Perimeter College – Newton Campus in Covington, Georgia. Dr. Johnson earned her Ph.D. in Physical Chemistry studying Photochemistry and Chemical Kinetics from Auburn University and her B.S. in Chemistry from Valdosta State University. She has recently been elected to serve as the Divisional Chair of Educational Science for the Georgia Academy of Science (2019). Dr. Johnson is a member of the American Chemical Society (ACS), and a member of the National Organization of Black Chemists and Chemical Engineers (NOBCChE). From 2010 to 2012, she served as President of the Auburn Chapter of NOBCChE, and Vice President from 2012 to 2013.

Dr. Johnson's area of expertise involves spectroscopic studies on peroxide formation in polymeric solutions and films by UV-Vis Spectroscopy and polymer characterization with FTIR, ^1H and ^{13}C -NMR Spectroscopy. The generation of light-induced polymeric radicals and the formation of peroxide in films main purpose is to create a coating to use on personal protective equipment that could degrade toxic, hazardous chemicals (i.e., pesticides, etc.). Dr. Johnson has authored and co-authored two articles concerning this research in the Journal of Physical Chemistry A. She is interested in introducing applied research to Associate-level college students and is currently participating in the Scholarship of Teaching and Research (STAR) Program to learn how to secure funding for such endeavors. Dr. Johnson is committed to encouraging students to excel in STEM related programs and professional development through their involvement in research and professional organizations.



Danielle Kain

Student, Mary Institute and St. Louis Country Day School

Danielle Kain attends Mary Institute and St. Louis Country Day School. Danielle is currently in the 10th grade. Danielle has always been interested in science, technology, engineering, and math (STEM). Danielle is a member of many different robotics teams including the River City Robots FLL team in fourth grade, two MICDS FLL robotics teams for fifth and sixth grade, and Rampunzel which is a high school all girls FTC team since seventh grade. Danielle's goal is to become an astrophysicist. In addition, Danielle would like to create more STEM interventions to increase the amount of women in STEM.

**Mariah Kain**

Student

Mariah Kain attends Jefferson Intermediate School, and she is in the 7th grade. Mariah has always been interested in science, technology, engineering, and math (STEM). Mariah was first introduced to STEM through her participation in Lego League Competitions and while observing her older sister's involvement with MICDS Ramborgs Robotics. Mariah is a part of several STEM programs such as Rampunzel team, Tech Challenge, and the Cyber Claws Robotics Team. Mariah is fascinated with research and would like to be a coding engineer when she grows up.

**ClauDean Kizart**

Education Plus, Missouri Model District Coaching Support

Dr. ClauDean Kizart is an educator who has made her passion her vocation! A native of Chicago and alumna of Harris-Stowe State University she has worked in the field of education for over 22 years. Currently she works with the St. Louis Regional Professional Development Center (RPDC) housed at Education Plus where she facilitates professional development and coaching to superintendents, administrators, and teachers on equity in education, literacy, and student engagement. Her teaching and professional development experience, in both the elementary and postsecondary sector of education, as well as her doctoral research has helped her become an emerging professional in providing data-informed equitable solutions to make a positive IMPACT in the field of education!

**Adam Lee**

Student, Chesterfield Montessori School

Adam Lee is a 6th grade student at Chesterfield Montessori School. Adam currently serves as a Best Buy Teen Tech Center Global Ambassador where he leads VR exercises and serves as a music studio engineer specialist for the Best Buy Teen Tech development team. In addition, Adam enjoys coding and fixing computers. Adam is also a skilled musician who mastered the keyboards by the age of seven and wrote his first song by the age of 9 years old. In 2017, Adam received the prestigious Dr. Martin Luther King Jr Essay and Speech Award. Adam wants to attend MIT and study coding. In the future, Adam wants to be a software developer and build music apps to make creating music easier to do and share with the world.



Danielle N. Lee

Assistant Professor of Biological Sciences, Southern Illinois University Edwardsville

Danielle N. Lee is an Assistant Professor of Biological Sciences at Southern Illinois University Edwardsville. Dr. Lee studies the behavior, ecology, and natural history of rodents across urban gradients, and shares commentary about engagement, recruitment, and diversity in the sciences and higher education on social media platforms. Her scholarship and scholar activism have been recognized by the National Geographic Society Emerging Explorer 2017, The Root100 (2017), TED Fellow (2015), EBONY Magazine's Power 100 (2014), White House Champion of Change in STEM Diversity and Access (2014), The Grio 100 Science & Technology Leader (2014), Black Family Technology Awareness Association of Kansas City S.T.E.M. Leader (2013), and the Urban League Young Professionals of Metropolitan St. Louis, Young Professional of the Year (2011). Dr. Lee is well known for her science promotion and outreach in social media. Follow her and her science commentaries on Twitter or Instagram at @DNLee5.



Joshua "Paco" Lee

Hip Hop Artist

Joshua "Paco" Lee is multi-instrumentalist, artist, producer, and songwriter from St. Louis, Missouri. He has a music background in Jazz performance at both Webster University and UMSL. He currently works for LIFE Arts Inc. as the Media and Music Production Fellow, producing projects and mentoring youth.



L.I.F.E. Arts

L.I.F.E. Arts is 501(c)(3) nonprofit that provides artistic resources, opportunities, mentoring and positive experiences to help students develop the qualities and skills they need to live up to their God-given potential. Noted performing artist, Brian Owens serves as the Executive Director. Since the events of Ferguson in 2014, L.I.F.E. Arts has been dedicated to developing the youth of this community and providing them with a platform wherein they can fully express and develop their creative voice. L.I.F.E. Arts is rooted in the belief that through the leadership skills and discipline of the arts, the youth of St. Louis can be a driving force, modeling the change that is so desperately desired to see manifested. In order to achieve this goal it is of the utmost importance that students living in underserved communities have access to consistent and localized programs, experiences and infrastructure. A community so rich in artistic talent should also have adequate facilities and resources. L.I.F.E. Arts serve youth that reside within a eight mile radius from the epicenter of Ferguson.

**Chantell Mason**

STEAM and PBL Teacher, Webster Groves School District

Chantell Mason is an innovative, experienced classroom educator of 11 years, dedicated to student achievement through Problem Based Learning, STEAM Education, education technology, and responsive teaching. Advanced in standards based, interdisciplinary curriculum writing. Specializing in Computer Science, Engineering, Life and Earth Sciences. She is a Computer Science Curriculum Writer for Cornell Tech, Director of STEM for ConnectED Learning 2016 Lead PBS LearningMedia Digital Innovator for Missouri, 2017 Regional Midwest Education Technology Committee Young Educator Award recipient, 2018 PBS Digital Innovator All-Star, and a 2018 ISTE Making IT Happen Award Winner. Ms. Mason earned her BS Ed. In Elementary Education from the University of Missouri, St. Louis, Magna Cum Laude and her MEd in Technology in Schools from the University of Missouri at Columbia. She has several certifications.

**Derek McFarland**

Junior Biology Major, Harris-Stowe State University

Derek McFarland, an East St. Louis, IL native, is a junior biology major at Harris-Stowe State University. He serves as a physics peer tutor through the support of the Historically Black Colleges and Universities – Undergraduate Program (HBCU-UP) Implementation Grant. At Harris-Stowe Derek is also secretary of the Biology Club and participates in various research activities through the Minority Science and Engineering Improvement Program (MSEIP). Additionally, he is a member of the Honda Challenge All-Star Challenge (HCASC) trivia team which will go to the National Championship Tournament in mid-April. Throughout his time at Harris-Stowe State University, Derek has engaged in many research projects. He holds the distinction as a Ronald E. McNair Scholar through Saint Louis University and a Washington University Honorary Tyson Research Fellow. During the summer of 2018, Derek conducted research on “The Prevalence of Babesia sp. Parasites in a Population of Carolina Wren.” He has presented his research at the Louis Stokes Alliance for Minority Participation (LSAMP) 19th National Role Models Conference in National Harbor, MD where he was awarded first place in his division and also at the Missouri – Louis Stokes Alliance for Minority Participation (MO-LSAMP) conference in Jefferson City, MO where he was awarded second place for his oral presentation. Derek has also presented at the Emerging Researchers National (ERN) Conference in Washington, D.C. where he earned an ERN travel award. During the summer of 2019, Derek will continue his research as a NIH/NIDDK intern through the STEP-UP program at Washington University exploring his interests in virus-host interactions in the respective labs of Dr. Adalsteinsson and Dr. Boon. Upon graduation from Harris-Stowe State University, Derek will continue his studies as a DVM/PhD and will become a wildlife veterinarian researcher.



Robert McNichols, Jr.

Assistant Professor of Music, Harris-Stowe State University

Dr. Robert McNichols, Jr., is an assistant professor of Music at Harris-Stowe State University and a bass-baritone. Dr. McNichols has been making a name for himself as an “artist worthy of being noticed” (The Kansas City Star, 2010). Upcoming performances for Mr. McNichols include returning as a guest soloist in the William Baker Festival Singers performance of Carmina Burana, co-producing a highlights concert of Wagner’s The Flying Dutchman in Kansas City, and a solo recital at the Sheldon Concert Hall in St. Louis. His most recent performances include the bass soloist in Beethoven’s 9th Symphony with Southern Missouri State University, the bass soloist in Mozart’s C Minor Mass with the William Baker Festival Singers, and two world premieres including The Devil and the Law with Chamber Project St. Louis, and the role of Oloferno in The Borgia Infami with Winter Opera.

Other performances include being a guest soloist with the Gateway Men’s Chorus performing Vaughn-Williams’ Five Mystical Songs, the baritone soloist in Manchester United Church’s performance of The Last Seven Words of Christ, and the roles of Mr. Bascombe, Starkeeper, and Dr. Seldom in Union Avenue Opera’s production of Carousel. He began the 2017 season as the Emcee for Opera Theatre of St. Louis’ community concert tour Opera Tastings, and as the Narrator for The Lincoln Portraits with the St. Louis Symphony. He also performed as co-producer, musical director, and soloist of A Classical Cabaret: Featuring excerpts of Gershwin’s Porgy and Bess with The Black Rep as part of their New Works Festival. Dr. McNichols is a graduate of the Lyric Opera of Kansas City’s apprentice program. Dr. McNichols earned Bachelor of Music from the Conservatory of Music at the University of Missouri, Kansas City and his Doctor of Music from the University of Kansas.



David Middleton

Student, Ferguson Middle School

David Middleton is a 7th grader that attends Ferguson Middle. David is also an active member with the Boys and Girls Club DIY STEM and robotics coding team. David enjoys coding, building robots and solving difficult math problems. David wants to be a scientist or technical engineer. He is really excited to get an opportunity to meet Dr. Aprille because she works for NASA and he would like to work there some day.

**Kendall Norris**

Chief Executive Officer, Global Leadership Forum

Kendall is the Chief Executive Officer with the Global Leadership Forum, a 501(c)3 organization focused on connecting the world's leading STEAM (science, technology, engineering, arts, mathematics) organizations who are engaging, educating, empowering and transforming underserved communities, and building tomorrow's workforce. He is accountable for developing and implementing the strategic direction, instituting transparency in the operations, compliance requirements, establishing effective fundraising programs and initiatives. He also partners with diverse communities to develop an inclusive organizational culture, speak for the GLF to enhance the public image, reputation and brand.

Before joining the GLF, Kendall was a Global Managing Director with Deloitte Global and sat on the Global Technology Executives Council. Additionally, his background includes 20+ years serving in technology leadership positions with global corporations.

Kendall's passions are people and education. Kendall is a member of the Fisk University Board of Trustees and serves on the boards of the College of Computing and Informatics at Lipscomb University and the Jackie Joyner-Kersey Foundation. He serves as the STEM chair for the Scouts BSA St. Louis region council and sits on the executive committee, has led international mission teams and helps others transform their lives through his consultancy, writing, speaking and coaching.

Kendall holds a BA degree in Communications from John Carroll University, an MBA from Case Western Reserve University. He is a Systems Engineering subject matter expert and holds a PMP certification.



Claudia Rankins

Program Director, HBCU-UP CREST, CAREER, National Science Foundation

Claudia Rankins is a Program Officer in the Directorate for Education and Human Resources at the National Science Foundation, where she manages the Historically Black Colleges and Universities Undergraduate Program and the Centers for Research Excellence in Science and Technology. Prior to this post, Dr. Rankins served at Hampton University for 22 years in a number of capacities, including endowed university professor, chair of the department of physics, assistant dean for research, and dean of the School of Science.

Her formal education includes military training, certification as translator and interpreter for German, French and English, a B.S. in Mathematics from Christopher Newport University, an M.S. in Statistics from Old Dominion University, an M.S. in Physics and a Ph.D. in Physics both from Hampton University.

Dr. Rankins is an advocate for STEM education and research at Historically Black Colleges and Universities. Her current research interests center around the history of STEM at these institutions. Her research in theoretical particle physics focused on the development of a model to describe distribution amplitudes and form factors of pseudoscalar mesons. Dr. Rankins is the co-founder of the Society of STEM Women of Color, Inc.



Christian Roberson

Student, Grand Center Arts Academy

Christian Roberson attends high School at the Grand Center Arts Academy. Christian is in the 10th grade and has a passion for STEM. Christian is a Best Buy Teen Tech Center ambassador. He oversees the coding and 3D printing station. Christian also specializes in M.I.T Media Scratch. He wants to attend college and become coding engineer.



Latonja Slaughter Robinson

Vice Principal at Wooddale High School

Latonja Slaughter Robinson is currently the Vice Principal at Wooddale High School located in Memphis Tennessee. She has more than 20 years of experience in STEM related careers. Prior to her position as Vice Principal, she was a professional learning Coach at Wooddale. Prior to this position, she was a science teacher at Central High School in Memphis, TN and at Lanier High School in Jackson, Ms. She served as a Microbiologist at the Water Laboratory for the City of Jackson, Ms. She earned both her B.S. and M.S. in Biology from Jackson State University as well as her Teacher Certification from Jackson State. She was selected to participate in the Emerging Leaders Program—New Leaders for New School and completed the Instructional leadership Licensure Program from Bethel University.



Stepphion Sutton

Student, Hazelwood East High School

Stepphion Sutton is a 9th grader at Hazelwood East High School and is an active club member at the Boys and Girls Club. Stepphion is involved with several STEM activities at the Boys and Girls Club and Hazelwood East High School. Stepphion has shown himself to be tech savvy expressing interest in technology and engineering. Stepphion is excited about attending this conference because he wants to network with his peers and meet other students who enjoy STEM. Stepphion would like to go to college and become an engineer, so that he can design new types of technology for the next generation of students.



Amyr Taylor

Student, Chaminade College Preparatory

Amyr Taylor is a 7th grade student at Chaminade College Preparatory. His primary interest are in basketball, football, swimming and technology. Amyr is currently enrolled in the STEM program at Chaminade College Preparatory where he is learning about coding and building mechanical gears. Amyr is a member of the Best Buy Teen Tech Center Global Ambassador team where he leads workshops and exercises in 3D printing for the Best Buy Teen Tech development team. Amyr has won several academic achievement awards from Chaminade College Preparatory in the areas of science and mathematics. Amyr wants to study medicine at Duke University and become a surgeon. He hopes to combine technology and medicine to improve medical science.



Dr. Dwaun J. Warmack

Preseident, Harris-Stowe State University

Dr. Dwaun J. Warmack serves as president of Harris-Stowe State University and at the time of his appointment was one of the youngest serving presidents of a four-year institution in the nation. Warmack brings more than 20 years of progressive administrative experience in higher education at five distinct higher education institutions. Dr. Warmack provides leadership to more than 450 full and part-time faculty and staff and oversees a budget in excess of \$32 million. Since his arrival in 2014, Harris-Stowe has witnessed a transformation, unheralded in its 160 year history. Dr. Warmack has shepherd more than \$15 million in external funding to the institution, including a \$5 million grant, the largest in the institution's history. He has cultivated more than 16 partnerships and collaborations with Fortune 500 companies, regional organizations and other higher education institutions to strengthen Harris-Stowe's infrastructure.

During Dr. Warmack's tenure, Harris-Stowe witnessed its highest gains in student enrollment in decades, posting the highest percentage enrollment increases among Missouri's public institutions for two consecutive years. Additionally, as part of the institutional strategic plan that he spearheaded, the institution embarked on an ambitious goal of expanding its academic offerings. As a result, degrees, minors, and certificate programs have increased by more than 40 percent. These includes expanding liberal arts and business degrees and Science, Technology, Engineering and Mathematics disciplines (STEM).

As a result of his executive leadership to transform the curricular and co-curricular enterprises at Harris-Stowe, the institution is ranked regionally and nationally in various publications and online journals with U.S. News and World Report ranking Harris-Stowe as one of the best HBCU's and Midwest Universities in the United States. Dr. Warmack's success at Harris-Stowe has captured national acclaim cumulating with a front-page article in the Chronicle for Higher Education, features in the New York Times, the Detroit Free Press and appearances on CNN, Al Jazeera America, C-SPAN and NPR.

He is considered a scholar-practitioner and possesses a wealth of experience in program design, faculty, student development, assessment and accreditation. Dr. Warmack's trajectory in higher education has extraordinary. Prior to his appointment as president of Harris-Stowe, he served as the senior vice president, administration and student services at Bethune-Cookman University overseeing a staff of 170. His successes include oversight of a multi-million dollar renovation of the institution's residence halls. Prior to his tenure at Bethune-Cookman, he was the associate dean of students at Rhodes College in Memphis, where he had oversight of student affairs including judicial affairs, student activities, Greek life, new student and parent orientation and multicultural affairs. Warmack has also held positions at Western Carolina University in Cullowhee, N.C., and Delta State University.

Dr. Warmack provides a brand of leadership that is characterized by an unqualified insistence on data driven decision-making and a commitment to higher education's current best practices. A visionary with a unique understanding and appreciation for today's millennial students, he is committed to academic integration and the holistic development of students. Warmack is committed to developing programs that promote diversity, pluralism and cultural competency. Throughout his career, he has championed inclusion, academic excellence and the retention of underrepresented students. Over the years he has presented more than 120 diversity and leadership presentations and workshops to an array of individuals and groups.

To bolster his executive fortes, Dr. Warmack has participated in a variety of professional development opportunities including the American Association of State Colleges and Universities' (AASCU), Millennium Leadership Initiative (MLI), and Hampton University's "On The Road to the Presidency: Executive Leadership Summit."

Dr. Warmack was named the Delta State University "Black Alumnus of the Year" and was inducted into the institution's Hall of Fame. Other awards and recognitions for his work in higher education and the community include but not limited to, Delux Magazine Power 100 "Trailblazer Award" Recipient, St. Louis Business Journal "40 under 40", St. Louis American "Salute to Excellence Young Leader Award", The Rickey Smiley Foundation "Trailblazer Award", Who's Who in Color Most Intriguing People and "Ten Most Dominant HBCU Leaders of 2018".

Dr. Warmack currently serves on the boards of the Cortex Innovation Community, the Saint Louis Science Center, the St. Louis Regional Chamber, St. Louis Muny, the Greater St. Louis Area Council Boy Scouts of America and Millennium Leadership Initiative Executive Steering Committee. His past board memberships include the United Way of Greater St. Louis, Southern Association for College Student Affairs (SACSA) Foundation, and the Alumni Board of Directors for Delta State University. Dr. Warmack is a peer reviewer with the Higher Learning Commission, the largest regional accreditation body in the United States.

Dr. Warmack earned a bachelor's degree in education and master's degree in sociology from Delta State University. He earned his doctorate in educational leadership with a specialization in higher education from Union University in Jackson, Tennessee, and his post-doctoral studies in educational leadership at Harvard University School of Education.



Cheryl Watkins-Moore,

Director, BioSTL STEM Entrepreneurial Inclusion Initiative

Dr. Cheryl Watkins-Moore, MBA currently serves as the Director for BioSTL's STEM Entrepreneurial Inclusion Initiative. BioSTL is a nonprofit organization focused in the life sciences that was a convener and one of the co-founders of St. Louis' robust start-up innovation community. In her role leading the region's efforts in driving Diversity, Equity and Inclusion in St. Louis innovation, Cheryl is responsible for creating partnerships, processes and programming that will strengthen and support talented women and minority entrepreneurs creating STEM ventures in our region.

Dr. Watkins-Moore is a serial entrepreneur; having co-founded and served as CEO of Accelerated Rehabilitation Technologies, a technology development company; developed and implemented BioSTL's Inclusion Initiative; and cofounded and currently co-hosts the internationally recognized Entrepreneurially Thinking podcast. She was invited to be an Adjunct Professor at Northwestern University's Law School, in their Masters of Science in Law Program teaching entrepreneurship.

Prior to her entrepreneurial career, Cheryl served in various levels of leadership in corporate entities with her last role as Vice President/General Manager for EMD Merck, a +\$100M chemical and specialty analytics business.

Dr. Moore earned her MBA from the Kellogg School of Management, Northwestern University, a Bachelor of Arts, Biology from Fisk University and is a Doctor of Podiatric Medicine, earning her degree from the Illinois College of Podiatric Medicine.

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