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Board on Higher Education and Workforce

SPEAKER BIOS (in alphabetical order by last name)

**University of the Virgin Islands Virtual Town Hall: Successes in STEM Education,
Research, and Workforce Preparedness**

Webcast Live Here: <https://www.nationalacademies.org/event/11-16-2021/university-of-the-virgin-islands-virtual-town-hall-successes-in-stem-education-research-and-workforce-preparedness>

November 16, 2021 | 1:00PM - 3:30PM EST

Karyl Askew, Ph.D., *Senior Research Scientist, University of the Virgin Islands (UVI)*

Dr. Karyl Askew is a Senior Research Scientist at the University of the Virgin Islands, funded by the Center for the Advancement of STEM Leadership (CASL), an NSF-funded project. Her professional work, scholarship, and service have focused on increasing the diversity of the next generation of scientists and scientific thinkers. Dr. Askew is an Educational Psychologist with 15 years of research and program evaluation experience applying a culturally responsive methodology. Overall, her body of work has centered on federal initiatives intended to broaden access for marginalized populations to innovative STEM education opportunities. Her research examines the convergence of psychological, cultural, and organizational factors that broaden participation and persistence in STEM pathways. She has co-authored peer-reviewed publications focused on gender differences in educational outcomes, HBCU STEM leadership in higher education, multicultural perspectives in the field of program evaluation, and reports that aid program leaders in integrating findings into policy and practice. Her portfolio of projects includes Investing in Innovation (i3; U.S. ED.), Alliance for Graduate Education and the Professoriate (AGEP; NSF) grant, and, Advancing Informal STEM Learning (AISL; NSF# DRL-1811234). Her scholarship is published in the APA Educational Psychology Handbook, the Handbook of Motivation at School, and Evaluation and Program Planning, along with reports that aid educational leaders and policymakers. Several regional and national organizations have invited her to share her culturally responsive equitable evaluation and research expertise, including the American Evaluation Association (AEA), local AEA affiliates, and private foundations. Dr. Askew holds doctoral and master's degrees in educational psychology, measurement, and evaluation from the University of North Carolina at Chapel Hill and a bachelor's degree in aerospace engineering from the University of Michigan-Ann Arbor. Dr. Askew currently resides with her family in Hillsboro, OR.

Karen H. Brown, Ph.D., MPH, CCC-SLP, *Dean of the School of Education and Associate Professor, UVI*

Karen H. Brown, Ph.D., MPH, CCC-SLP is Dean of the School of Education and Associate Professor at the University of the Virgin Islands. Dr. Brown holds a PhD in special education with a concentration in curriculum and instruction. She has two master's degrees in speech-language pathology and public health, respectively. Dr. Brown has 29 years of experience as a speech-language pathologist and maintains the Certificate of Clinical Competence (CCC) by the American Speech-Language-Hearing Association (ASHA). She continues to practice across the lifespan. Dr. Brown is a 2014-2015 trainee of the Georgia Leadership Education in Neurodevelopmental and Other Disabilities (GaLEND) program and 2015 graduate of the National Leadership Consortium on Developmental Disabilities. At the national level, she serves as a committee member of the Georgetown University National Center for

Cultural Competence (NCCC) Community of Practice (CoP) on Cultural and Linguistic Competence in Developmental Disabilities National Advisory Committee. In addition, Dr. Brown is the Centers for Disease Control and Prevention's (CDC) Act Early Early Ambassador to the U.S. Virgin Islands for the "Learn the Signs. Act Early. health promotion campaign." At the local level, Dr. Brown serves as a member of the VI Advisory Panel for Special Education (VIAPSE) of the VI Department of Education, as well as the Maternal and Child Health (MCH) Advisory Board and Interagency Coordinating Council for the Infants and Toddlers (ITP) Part C program of the VI Department of Health.

Lawanda Cummings, PhD, *STEM Education Director/Workforce Development, Virgin Islands-Established Program to Stimulate Competitive Research (VI-EPSCoR)*

Dr. Lawanda Cummings is the Director of STEM Education Research and Workforce Development for The Virgin Islands Established Program to Stimulate Competitive Research (VI-EPSCoR) grant and Co-Director of the Florida-Caribbean Louis Stokes Regional Center for Excellence (FL-C LSRCE), managing nearly 4 million dollars. As a Community Psychologist and Director Virgin Islands Institute for STEM Education Research and Practice (VI-ISERP), Cummings promotes a strength-based approach to school-based interventions, community outreach, and research development. Currently, her research focuses on the inclusion of minorities and women in STEM fields through academic and workforce inclusion, development of non-cognitive skills to promote STEM success, and the development of culturally congruent curricula and interventions at the k-12 and higher education levels.

Michele Guannel, PhD, *Assistant Professor of Biology, UVI*

Dr. Michele Guannel is an Assistant Professor of Biology on the St. Thomas campus of the University of the Virgin Islands. She holds a B.A. in Biology from Smith College and M.S. and Ph.D. degrees in Oceanography from the University of Washington. At these institutions and through other positions, she has taught elementary students to postdoctoral scholars for over 20 years. Dr. Guannel's research explores the power of service learning and other high-impact practices, to increase recruitment, retention, and persistence of UVI students in STEM fields. She measures the impacts of project-based learning and real-world applications through quantitative assessments of student affinity for, and engagement in, STEM fields, as well as the phenomenological analysis of themes that emerge from students' lived experiences.

David Hall, SJD, *President, UVI*

Dr. David Hall began his tenure as the fifth president of the University of the Virgin Islands on August 1, 2009. Under Dr. Hall's leadership, UVI has made important strides toward raising the image and position of the University. He led the effort to change the structure of the academic units from divisions to colleges and schools. Additionally, new academic programs, such as a Master of Arts in Counseling Psychology and a Bachelor of Business Administration in Hospitality and Tourism Management have been instituted. The University has also launched a new Caribbean Center for Green Technology, a Center for the Study of Spirituality and Professionalism, and an Institute for Leadership and Institutional Effectiveness. A recycling program has been implemented on both campuses as part of the UVI Goes Green initiative. In order to ensure that all students who enter the University achieve and realize their dreams of academic success, President Hall launched a Center for Students Success which provides coordinated and comprehensive support to students throughout the University. To ensure that UVI students from St. John as well as members of the St. John community are better served by the University, UVI established and now operates an Academic Learning Center on St. John that provides video conferencing and face to face classes daily. The University has also forged a closer working

relationship with public and private schools throughout the Territory. UVI now sponsors an expanded Summer Bridge Program, a Junior University for 8th grade males, and other outreach efforts to ensure that more Virgin Islands students see college as an obtainable goal and are equipped to succeed at an early age. Working with leaders within the Virgin Islands Department of Education and the V.I. Board of Education, President Hall established a P-16 Collaborative to create a seamless pathway to success from preschool to college. Under President Hall's leadership, the University received a \$1 million pledge to create a science building, and a \$5 million gift to create the 13D Student Entrepreneurial Competition and fund the Kiril Sokoloff endowed professorship in Entrepreneurship. Alumni contributions have also doubled since his tenure as President. The University has also constructed a 100-bed state-of-the-art residence hall on St. Thomas, and has worked with the Research and Technology Park to construct an academic building on St. Croix. Dr. Hall is also committed to inclusion and transparency, which he views as hallmarks of strong leadership. As such, he has worked to implement a new, open and transparent University that upholds the tenets of shared governance. He has convened presidential advisory committees on both campuses, and has a presence on both campuses.

Born in Savannah, Georgia, Dr. Hall holds a bachelor's degree from Kansas State University, where he was named an "All American" for his athletic and scholarly accomplishments. After graduating from Kansas State, he played professional basketball in Italy. He received his doctor of jurisprudence (JD) from the University of Oklahoma, where he also earned a master's degree in Human Relations. He holds both an LL.M. degree and a doctorate of juridical science (SJD) from Harvard Law School. In 1993, when he was appointed dean of the Northeastern University School of Law, he made history by being the first African-American to hold the position. He also served as Provost and Senior Vice President of Northeastern University, and was also the first African American to hold that position. Having taught law for more than 25 years in the law schools of the University of Mississippi, the University of Oklahoma and Northeastern University, Dr. Hall has enjoyed a distinguished career as an educational administrator and preeminent scholar in the field of law. In May 2010, in recognition of his significant contributions to the legal field, Dr. Hall was awarded the honorary degree of Doctor of Laws from the New England School of Law in Boston, Massachusetts. He has been honored by the Massachusetts Black Lawyers Association as a Trailblazer. Dr. Hall was appointed by President George W. Bush to serve on the Legal Services Corporation Board of Directors. His publications include works on civil rights, the U.S. Constitution and race, legal education, and social justice. He has authored a book on the intersection of law and spirituality, entitled "The Spiritual Revitalization of the Legal Profession: A Search for Sacred Rivers," and lectures nationally on topics of social justice, leadership, diversity and spiritual values in professional life. He is married to Dr. Marilyn Braithwaite-Hall, and is the father of three children: Rahsaan, Sakile and Kiamsha.

Camille A. McKayle, PhD, *Provost and Vice President of Academic Affairs, UVI*

Dr. Camille A. McKayle is Provost and Vice President of Academic Affairs at the University of the Virgin Islands (UVI). Previous to this, she served as Dean of the College of Science and Mathematics. As Provost, she led the development of UVI's first PhD program in Creative Leadership for Innovation and Change, which graduated its first PhD recipients in 2018. She has successfully served as PI or co-PI on a variety of grant projects from National Science Foundation, NASA, Department of Defense, and the Mathematical Association of America. Her grant projects have totaled more than \$10 million for the university. She currently serves as PI for three National Science Foundation projects: The Center for the Advancement of STEM Leadership (CASL; collaborative with North Carolina A&T State University, Fielding Graduate University, Association of American Colleges and University and UVI as lead), UVI's HBCU-Undergraduate Program grant, and Florida-Caribbean Louis Stokes Alliance for Minority

Participation Regional Center of Excellence (collaborative with Santa Fe College). Together, these programs aim to broaden participation in the Nation's STEM (Science, Technology, Engineering and Mathematics) enterprise through focus on undergraduate STEM education. From 2005 - 2008, Dr. McKayle was Program Officer at the National Science Foundation for the Historically Black Colleges and Universities Undergraduate Program, in the Division for Human Resource Development in the Directorate for Education and Human Resources. Dr. McKayle received her Ph.D. in Mathematics, from Lehigh University (Pennsylvania). Her undergraduate degree in Mathematics is from Bates College (Maine). She recently completed a Master's Certificate in Creativity and Change Leadership from Buffalo State College's International Center for Creativity Studies. Her current research interests are in the areas of Creativity Studies, Creativity and Leadership, STEM Education and STEM Leadership.

Verleen McSween, PhD, *Assistant Professor of Biology, UVI*

Dr. Verleen McSween is an Assistant Professor of Biology in the College of Science and Mathematics at UVI. She currently teaches undergraduate courses in biology, science, and chemistry. Each summer, Verleen coordinates the activities of several summer programs to facilitate research experiences, mentorship opportunities, and professional development workshops for undergraduate students in STEM-related fields. Additionally, Dr. McSween serves as the current UVI faculty liaison for the Florida-Caribbean Louis Stokes Regional Center of Excellence (Fl-C LSRCE) and the MARC/ RISE Coordinator for the Albert A. Sheen Campus. She serves a STEM Education researcher in the Virgin Islands Institute for STEM Education Research and Practice, which focuses on providing professional development opportunities grounded in research-based best practices for K-12 STEM educators in the local community. She is co-lead for the Mentoring and Research Infrastructure Component of Education and Workforce Development. Her research interests include:

- Psychosocial Interventions
- Informal Science Learning
- Best practices in undergraduate and graduate mentoring
- Building Research Infrastructure for Early Career Faculty

Nadia Monroe Mills, PhD, *Assistant Professor of Mathematics, UVI/Component Lead for Teacher Professional Development (VI-EPSCoR)*

Dr. Nadia Monroe Mills is an Assistant Professor of Mathematics at the University of the Virgin Islands. She is a STEM education researcher whose current research agenda lies in two areas: (1) mathematics teaching and learning, and (2) STEM teacher professional development. She is the educational researcher on the innovative ACE Implementation Project: The UVI Growth Model, which not only seeks to improve student content knowledge but to also impact the environment in which the student belongs, both academic and social. This project measures the impact of our STEM programs on psychosocial factors, such as mathematics self-efficacy and anxiety, theories of intelligence, and sense of belonging. She is recently the PI of her BCSEF NSF award where she studies the effects of an active learning intervention, Peer-Led Team Learning (PLTL) on students and peer leaders psychosocial factors. In her research on STEM teacher professional development, she directs the STEM Institute, which provides professional development to middle and high school STEM teachers to strengthen the STEM workforce in the Virgin Islands. In this capacity, she partners with other STEM Institute researchers to design and implement a professional development model that includes a summer workshop and yearlong support and trainings. She provides support to teachers through trainings in instructional strategies in the mathematics classroom, pedagogical content knowledge, project based learning, Common Core Standards for Mathematics, curriculum design, and action research.

Molly Perry, PhD, *Assistant Professor of History and Geography, UVI*

Dr. Perry received her PhD in History from the College of William and Mary and her undergraduate degree from Middlebury College. Her principal research is in the dynamics of protest and resistance during the 18th Century Age of Revolution in the Greater Caribbean. Her published work explores the diversity of colonial protests and traces the emergence of the American Protest tradition. An advocate of making history accessible and alive, she has worked for several museums and archives, including the Smithsonian National Museum of American History, the Darwin Correspondence Project, and the National Archives and Records Administration designing lesson plans and resources for K-12 teachers. At the University of the Virgin Islands, Dr. Perry teaches a variety of courses on Caribbean History and Geography, highlighting how the natural world shapes human societies over time. Her presentation today is part of her work redesigning the first year course Introduction to the Social Sciences: A Caribbean Focus.

Michelle Peterson, PhD, *Interim Dean of the College of Science and Mathematics, UVI*

Michelle D. Peterson is an Associate Professor of Biology and Interim Dean, College of Science and Mathematics at the University of the Virgin Islands. After receiving her PhD in cell biology from Yale and subsequent postdoctoral study in molecular genetics at Duke, she began teaching interdisciplinary general education science courses at UVI, as well as some biology classes. This, along with evaluation and assessment of those courses, led to involvement in STEM education in general. She has been co-PI on several NSF-funded projects, including a Math and Science Partnership Planning grant and a Noyce Capacity Building project: STEM Teach VI. The team created and is working to implement a strong STEM teacher preparation program at UVI, recruit STEM majors into teaching, and investigate the factors that influence learning in the VI classroom – understanding the context in which VI students live and learn. Her interest in the STEM pipeline extends from teaching in summer science academies for junior high students to now supporting junior faculty in her role as interim Dean.

Rosalia Rhymer-Rohan, *Director, University Bound Program, UVI*

Rosalia Rhymer-Rohan is Director of the University Bound Program (UB) (formerly Upward Bound Program) at the University of the Virgin Islands. She has served as Director since 1988. From 1978-1988 she served as Assistant Director for the program. For more than 40 years she has demonstrated a commitment to assisting UB students in their quest for higher education. She has assisted hundreds of Virgin Islands students and their families in charting their progress toward completing high school and going on to pursue post-secondary education. Rosalia is a co-founder and chairperson of the UB Academic Growth Scholarship Committee. Prior to her employment at the University, she served as a classroom teacher. Rohan received a MA (Education) from the University of Connecticut ('78) and a BA (Elementary Education) from the College of the Virgin Islands ('74). As director of the University Bound Program, Rohan's mission has been one of motivating, guiding and assisting secondary school students (territory wide), to complete high school, enroll and succeed in post-secondary education, (UVI is priority) realize fulfilling careers, and becoming productive citizens. Ultimately, her mission is to assist in increasing the college going and college completion rates in the US Virgin Islands.

Aimee Sanchez, *Grants Manager, Emerging Caribbean Scientists (ECS) Program, UVI*

Aimee Sanchez serves as Grants Manager for the Emerging Caribbean Scientists (ECS) Program in the College of Science And Mathematics at the University of the Virgin Islands. Ms. Sanchez provides support to several Principal Investigators with federal grant awards for student research training from agencies like the NIH and NSF, among others. She manages budget oversight and reporting while assisting with organizing activities, communicating and interacting with students, and assists with

overall program administration. She is highly involved in recruitment and retention of students to improve diversity in STEM and is especially passionate about inspiring young girls to pursue careers in technology. Aimee grew up and lives on St. Croix. She is a graduate of UVI's Dual Degree Program, with a BS in Applied Math from UVI and a BS in Computer Engineering from Columbia University. She is currently pursuing a Master's in Public Administration.

Jarvon Stout, *Community Engagement Specialist, Virgin Islands-Established Program to Stimulate Competitive Research (VI-EPSCoR)*

Born and raised on the island of St. Thomas, Jarvon Stout has always had a deep fascination for the natural spaces they have in the Territory. This interest turned into a passion for learning more about, and preserving their natural resources which led to him earning a Bachelor of Science degree in Marine Biology from the University of the Virgin Islands in 2018. Since then, he has proudly served as the Community Engagement Specialist for the Virgin Islands - Established Program to Stimulate Competitive Research (EPSCoR) where he plays a role in; 1) Educating, involving and empowering local Virgin Islanders in the realms of both environmental literacy and stewardship, 2) Creating pathways and providing opportunities that make it possible for local VI youth to gain interest in STEM and pursue STEM careers and, 3) Working with local stakeholders to develop more culturally responsive education and outreach strategies. His role puts him in a position to be part of the movement to create a more environmentally conscious, STEM literate and competitive US Virgin Islands.

Kim Waddell, PhD, *Director, Virgin Islands Established Program to Stimulate Competitive Research (VI-EPSCoR)*

Kim Waddell is the project lead for the next US Virgin Islands Hazard Mitigation and Resilience Plan Update with support from FEMA and the Virgin Islands Emergency Management Agency (VITEMA). He is also the Director for the Virgin Islands Established Program for Stimulating Competitive Research (VI-EPSCoR)—a National Science Foundation-supported research capacity building program based at the University of the Virgin Islands that focuses on land-based impacts on marine ecosystem health and function in a time of Climate Change, as well as STEM education research and opportunities for underrepresented minority students from K-12 through MS degrees. Prior to that, Kim was a Senior Program Officer with the National Academies of Sciences, Engineering, and Medicine. Dr. Waddell served as a study director for over a dozen National Academies reports on agriculture, fisheries and other natural resource management topics. Kim received his Ph.D. in Biological Sciences from the University of South Carolina and his B.A. in Environmental Studies from the University of California, Santa Cruz.