

Mapping Connections between STEM and Social-Emotional Development (SED) Conference

Revised May 18, 2020

Participant Directory



Conference Organizers

Gil G. Noam, Founder and Director, The PEAR Institute, serves as project PI. Dr. Noam is a clinical and developmental psychologist with a strong interest in translating research and innovation to support youth in educational settings. He has published over 200 papers, articles, and books in the areas of education and child and adolescent development in clinical, school, and afterschool settings. Dr. Noam's group has developed a comprehensive approach to informing on the quality of students' STEM learning experiences and providing a common language around STEM outcomes. Noam's appointment at Harvard Medical School and the connection to one of its teaching hospitals specializing in psychological disorders and prevention makes for strong institutional connection between science and social and emotional development.

Patricia J. Allen, Manager of Research and Evaluation, The PEAR Institute, serves as co-PI. Dr. Allen is the head of the Research and Evaluation Department at The PEAR Institute and Instructor in Psychiatry at Harvard Medical School. Her expertise focuses on translational research in two core areas: STEM and social-emotional learning (SEL). She has a demonstrated record of research productivity in the areas of psychiatry, neuroscience, and STEM education. She supports multiple national evaluation efforts to measure STEM and SED and to inform continuous improvement to help ensure that youth across the country have positive, high-quality experiences when they participate in STEM activities.

Kristin Lewis-Warner, Manager of STEM Partnerships and Initiatives, The PEAR Institute, serves as Project Manager for the conference, working closely with Dr. Klein to organize the conference. She will provide the evaluation of the conference deliverable. She is a research and evaluation professional with over ten years of experience in the education sector, with a focus in STEM learning, out-of-school time (OST) learning, teacher professional development, and student-centered learning. She holds a B.A. in Developmental Psychology and an M.Ed. in Learning, Cognition, and Development. Before joining PEAR in April 2017, Ms. Lewis-Warner worked as an independent consultant serving as an external evaluator on multiple Massachusetts-based initiatives. She was drawn to PEAR's exploration of theory, research, and practice in both STEM and SED.

Christine (Kit) Klein, Director, Insight for Learning Practices LLC, serves as Co-PI and conference coordinator. She recently served as co-PI and co-organizer of the Roads Taken – Long-term Impacts of STEM Youth Programs conference (NSF #1644479) and is a Co-PI on the current Roads Taken research project (NSF #1906396). Dr. Klein has provided STEM education research and evaluation services to informal learning organizations for over 25 years. Her work with youth programming includes external evaluator for STEM youth programs in OST and lead researcher in an impact study of a SED-focused youth OST art program.

This conference is supported by the National Science Foundation under grant #1940155.























Conference Evaluator

Carey Tisdal, Director, Tisdal Consulting, serves as evaluator of the conference process. She brings over 25 years of experience as an internal and external evaluator primarily in STEM informal learning settings. Her evaluation experience includes the evaluation of Museum Tech Academy, funded through the NSF ITEST program, which engaged teens in archeology project-based learning involving technology skills and evaluation work with the Youth Exploring Science (YES) program at the St. Louis Science Center. She served as Co-PI and conference co-host on the NSF-funded Roads Taken – Long-term Impacts of STEM Youth Programs conference (NSF #1644479) and is a Co-PI on the current Roads Taken research project (NSF #1906396).

Steering Committee

Dale Blyth is senior consultant and Extension Professor Emeritus in the College of Education & Human Development at the University of Minnesota where he served as the Howland Endowed Chair in Youth Development Leadership. For 15 years he served as Associate Dean and Director of the Center for Youth Development which was home for the *Minnesota 4-H Program* (with over 100 staff and 10,000 volunteers touching over 100,000 youth annually); the *Youth Work Institute* (developing and delivering professional development to thousands of youth workers annually), *Youth Community Connections* (then the statewide Mott network) while also conducting applied research and evaluation on afterschool and youth development opportunities. Prior to that Dr. Blyth was the Director of Research and Evaluation at Search Institute; on the faculty of Cornell University and Ohio State University; and co-developed the Center for Adolescent Health at the American Medical Association. Dr. Blyth is a public speaker and author of a book, many chapters, and dozens of articles. His work focuses on access to, participation in, the quality of and outcomes from non-formal learning opportunities. Dr. Blyth uses his experience in bridging research and practice to help shape the fields of youth development and non-formal learning.

Jim Chesire is President of Bolster Mission Consulting. In 2014, the Imagine Science partnership engaged Bolster Mission and Jim has served as the project's founding consulting national director since. Before founding Bolster Mission, Jim was Project and Executive Director of the Chicago Out-of-School Time (OST) Project & Chicago Allies for Youth Success where he oversaw the six-year (2006 – 2012), \$11M Wallace Foundation grants to Chicago to build a citywide youth OST service infrastructure including shared data systems, program quality standards and capacity building. Born in New York City, Jim currently calls the foothills of the McDowell Mountains home together with his wife and daughter. He has a master's degree in Education & Human Development from Harvard University and has studied finance at the Aresty Institute for Executive Education at the Wharton School/University of Pennsylvania.







Heidi Ham is the Vice President of the National AfterSchool Association (NAA), a product of afterschool programs, a long-time NAA member, and leader in national youth work. Ms. Ham holds a historical and national perspective with expertise that mirrors her experience in producing quality programs and professional development. At NAA, Ms. Ham works to foster positive youth outcomes by supporting developing and advocating for afterschool professionals and leaders. Her work drives many of NAA's offerings, including the Leading with Emotional Intelligence Fellowship, the Core Knowledge and Competencies for Afterschool and Youth Development Professionals, virtual conventions, the NAA Professional Credentialing System, and the Healthy Eating and Physical Activity Standards efforts. Her recent work includes co-authoring Core competencies for the OST field, a chapter in *The growing out-of-school time field: Past, present, and future* Journal and *SEL to the Core: Building from Foundational Youth Development to Support Social and Emotional Learning*.

Prior to NAA, Heidi was a Senior Quality Advisor for an organization with afterschool programs nationwide. Ms. Ham has earned K-12 teaching certification, a Bachelor's degree in social science and education, and a graduate certificate in training and development.

Natalie S. King is an assistant professor of science education at Georgia State University. Her scholarly work focuses on advancing Black girls in STEM education, community-based youth programs, and the role of curriculum in fostering equity in science teaching and learning. Dr. King is passionate about preparing students to enter careers within the STEM disciplines and founded I AM STEM- an informal STEM program that provides comprehensive curricula embracing students' cultural experiences while preparing them to become productive and critically-conscious citizens. She challenges the capitalistic agenda for encouraging girls' involvement in STEM, and reframes STEM as a mechanism to promote sisterhood and social justice. Natalie King is a National Science Foundation CAREER Award recipient exploring the brilliance and STEM identity development of Black girls. Dr. King is also interested in dismantling divisive walls and centering faith-based institutions as an underutilized resource in communities. She believes that churches have the potential to be a driving force for STEM Education, and can positively impact younger generations by promoting intergenerational relationships, civic leadership, and activism. Dr. King offers trainings and curricular support so that organizations can deliver high-quality and affordable STEM programs to develop this generation's scientists, engineers, entrepreneurs, inventors, and mathematicians.

Ellie Mitchell, Director, Maryland Out of School Time (MOST) Network, is dedicated to increasing the quantity and quality of afterschool and summer programs for all young people in Maryland. She received her M.S. in Psychology from the University of Baltimore and B.A. in Theatre from Knox College. In her ten years serving as Maryland's statewide afterschool network lead, Mitchell has overseen the launch of new initiatives focused on Inclusion, STEM, and Community Schools. Ellie has also served as Afterschool Strategy Project Manager for Baltimore's Safe and Sound Campaign, Director of Theater for A New Generation at Baltimore's CenterStage, and the Associate Director of the Greater Baltimore Cultural Alliance.







Michael C. Rodriguez is Associate Dean of Undergraduate Education, Diversity, and International Initiatives of the College of Education and Human Development; and Professor of Quantitative Methods in Education in the Department of Educational Psychology at the University of Minnesota. He holds the Campbell Leadership Chair in Education and Human Development with a focus on educational equity and is a member of the University's Academy of Distinguished Teachers. He is member of the Board of Directors of the National Council on Measurement in Education and currently chairs the U.S. Department of Defense Advisory Committee on Military Personnel Testing and the Technical Advisory Group of the National Board of Professional Teaching Standards. The MN Youth Development Research Group, which he directs [https://sites.google.com/view/mnydrg], has developed a body of work investigating the role of SEL in various educational outcomes for underprivileged and disadvantaged youth. The group also has deeply explored psychometric approaches to the validation of SEL score interpretation. His most recent book is *The college instructor's guide to writing test items: Measuring student learning* (2017).

Colin Rose is currently an Assistant Superintendent at the Boston Public Schools heading the Office of Opportunity Gaps and will soon transition to be the full-time President at the newly formed BlackPrint Education. Among other engagements, BlackPrint Education will be building and running the first Culturally Responsive Practices Leadership Academy for the Massachusetts Department of Elementary and Secondary Education (DESE). In the academy, BlackPrint will support a cohort of district leadership teams from across the state in building internal local capacity to weave culturally responsive practices and a racial equity lens throughout their pedagogy, policies, structures, and systems.

As Assistant Superintendent for 4 ½ years, Dr. Rose has been able to build a legacy of effective systemic initiatives, workstreams, professional development, and programming. Among these are the authoring of the Culturally and Linguistically Sustaining Practices continuum (CLSP); the authoring and implementation of the Opportunity and Achievement Gaps Policy Implementation Plan; the co-creation of the BPS Racial Equity Planning Tool, a now mandatory planning process for major decisions in the district; and the cultivation of multiple innovative programs such as Excellence for All, a school model that aims to foster culturally responsive and rigorous 21st century instruction and supports, including STEM.

Robert Tai, is an associate professor of science education at the Curry School of Education at the University of Virginia. His work has included research on the high school to college transition of students in science disciplines as well as scientific workforce development from an educational perspective. Tai co-edited the 2010 volume "AP: A Critical Examination of the Advanced Placement Program." His research studies have been sponsored by the National Science Foundation, the National Institutes of Health, the Robert N. Noyce Foundation, and the S. D. Bechtel, Jr. Foundation. He has published research studies in the journals Science, Science Education, International Journal of Science Education, and the Journal of Research in Science Teaching, among others. In 2008, Tai received the Council of Scientific Society Presidents Award for Education Research Leadership. His educational background includes degrees in physics, mathematics, and education. He earned a doctorate from the Harvard Graduate School of Education in 1998 after teaching physics for three years in high school and middle school.







Kathleen Traphagen's consulting practice facilitates education and youth developmentfocused grantmaker networks to engage in shared learning and collaborative action, with a focus on listening to proximate voices and elevating philanthropy's role in addressing inequities. She also authors working papers and leads strategic planning for foundations, non-profits, and government agencies. Publications she has authored or co-authored include: The Essential Funders' Guide To STEM-Focused Family Engagement: Seven Strategies to Support Families in Advancing Young People's STEM Interest, Persistence, and Achievement (Feb 2020); From Niche to Necessary: Scale and Sustainability Lessons from the FUSE Initiative, (2018); How Cross-Sector Collaborations are Advancing STEM Learning (2014); and Assessing the Impacts of STEM Learning Ecosystems (2015).

Before beginning her consulting practice, Kathleen was Executive Director of Boston's 2:00to-6:00 After-School Initiative, where she led the effort to bring together the City of Boston, the Boston Public Schools, the philanthropic and corporate sectors, and cultural and community-based organizations to expand and improve out-of-school time programming. 2:00-to-6:00 sparked the creation of Boston After School & Beyond, recognized as a national model in the field. Kathleen received her BA with Honors from Carnegie Mellon University and her MBA from Northeastern University.

Heather Toomey Zimmerman is learning scientist who uses design-based research methods to study the cognitive and social resources used by young people outside of school. She analyzes how multiple learning experiences contribute to families' and children's understanding of scientific knowledge, practices, and career trajectories. At Penn State, Heather is an associate professor of education who brings together the learning sciences, informal science education, and learning with mobile computers in her teaching and research. Heather's projects are related to families and youth in summer camps, libraries, museums, science centers, and nature centers. She investigates how curiosity, identity, interest, and expertise are related to science learning.





Panelists Day 1

Michael Funk, Director of the Expanded Learning Division (EXLD) for the California Department of Education (CDE), was appointed in 2012. The EXLD, with deep field engagement at the start, developed "A Vision for Expanded Learning in California, Strategic Plan 1.0: 2014–2016". The impact of this Strategic Plan resulted in numerous successes in embedding quality, systems, and technical assistance to support programs and elevate expanded learning as a key partner in the K–12 education system. The plan created a California statewide system of support comprised of members of the CDE, County Offices of Education, and Statewide Contracted Technical Assistance Providers.

Michael led the second iteration, "A Vision for Expanded Learning in California, Strategic Plan 2.0: 2019–2023", to sustain California's momentum and innovative path to support quality expanded learning programs across the State.

This System of Support for Expanded Learning has been working with the Center for Systems Awareness for many years to support staff and students through the Compassionate Systems Framework.

Prior to this role, Michael worked in San Francisco and founded the Sunset Neighborhood Beacon Center in the early 1995 and founded Experience Corps Bay Area in 1998. Michael also co-founded and co-led the Learning In Afterschool and Summer initiative, a partnership with Temescal Associates.

Colin Rose – See Bio Page 4

Kathleen Traphagen – See Bio Page 5

Panelists Day 2

Robert J. Jagers is the Vice President of Research at the Collaborative for Academic, Social and Emotional Learning (CASEL). Among his various CASEL duties, Dr. Jagers is leading work with partnering districts to explore how social and emotional learning can be leveraged to promote equitable learning environments and enhance developmental outcomes, especially for students from under-served groups. He has a particular interest in transformative approaches to SEL and their implications for the civic development of children and youth. Prior to joining CASEL, Dr. Jagers was a faculty member in the Combined Program in Education and Psychology at the University of Michigan, a Co-PI of the Center for the Study of Black Youth in Context (CSBYC) and the founding director of Wolverine Pathways, a university-sponsored diversity pipeline program for qualified secondary school students. Dr. Jagers earned his PhD in Developmental Psychology at Howard University.



Natalie King – See Bio Page 3

Robert Tai – See Bio Page 4



Participants

Jamie Bell is the Project Director of the Center for Advancement of Informal Science Education (CAISE) at the Association of Science and Technology Centers (ASTC) in Washington DC. CAISE is a National Science Foundation-funded resource center charged with characterizing, connecting and convening the professional field of informal STEM learning. Prior to joining CAISE he led programs and projects at the Exploratorium, the Harvard Smithsonian Center for Astrophysics Science Media Group, and the Discovery Center in Kuala Lumpur, Malaysia. Jamie spent 10 years managing the High School Explainer Program at the Exploratorium in San Francisco, where social-emotional development was a goal on par with STEM learning for the program participants (based on an earlier understanding of the construct).

Xan Black is the Program Director of the Tulsa Regional STEM Alliance (TRSA). Xan's drive, passions, and leadership of the Alliance supports all aspects of STEM education. She aligns the experience and wisdom of community partners with the need of educators and schools. She is responsible for project management, strategic planning, program implementation and more. Xan graduated with a Bachelor of Science degree in Petroleum Engineering from Texas Tech University in 1981. She worked for eight years in the energy industry in Oklahoma. In 2007, Xan earned a Master of Education degree with emphasis in Middle and Secondary School from Southwestern Assemblies of God University. She taught secondary math and science for 11 years at Mingo Valley Christian School. Xan and her husband, Jeff, have five adult children and have lived in Tulsa since 1990.

Crystal E. Brown oversees the strategic direction for program and training development in her role as the National Vice President of Youth Development for Boys & Girls Clubs of America (BGCA), which serves a network of 4,700 Clubs in urban neighborhoods, rural communities, schools, public housing and Native lands across the country and on military installations worldwide. She is responsible for a portfolio of youth development programs, ensuring that BGCA delivers developmentally appropriate, evidence-informed programs integrated with social-emotional development skills and practices, trainings and assets that support positive outcomes related to Academic Success, Character and Citizenship and Healthy Lifestyles.

Chrissy Chen is the Senior Director of Youth Development Programs at Boys & Girls Clubs of America leading the Education team. In this role, she manages the portfolio of programs, tools and resources designed to ensure that youth in Clubs fall in love with learning and become more effective, engaged, adaptive learners who are on track to graduate with a plan for the future. Prior to working with Boys & Girls Clubs, Chrissy taught in Atlanta Public Schools, supported students with brain and spinal cord injuries at the Shepherd Center, and studied how people learn at the Harvard Graduate School of Education.









Susan Cody Ciavolino serves as a director of Youth Development Programs at the Boys & Girls Clubs of America. She has worked for 40 years in a variety of formal and informal education settings, including classroom teacher, preschool administrator, and adjunct professor. She began working in OST STEM programming with LET'S GO Boys and Girls in 2010 as a researcher, grant writer, and program consultant. In 2011, Susan became STEM Education Director at the Boys & Girls Clubs of Harford County, MD, where she developed a comprehensive STEM Education program for youth ages 6-18. She joined Boys & Girls Clubs of America in 2016 to support local Boys & Girls Club staff in STEM and has been involved in developing innovative approaches to a variety of projects in the Education portfolio, including Summer Brain Gain and Power Hour. She has a BA from the University of Georgia and a MS in Education from Pensacola Christian College.

Patti Curtis is the Robert Noyce/Ellen Lettvin STEM Education Fellow serving in the Office of Planning, Evaluation and Policy Development at the U.S. Department of Education (ED). She is involved in ED's STEM efforts including competitive grants, out of school programs, STEM newsletter and briefing series. She participates in the Interagency Working Groups on Strategic Partnerships, Convergence, and building a STEM Portal.

Previously, Curtis served as the Director of the Washington, D.C. Office of the Museum of Science and their National Center for Technological Literacy, where she focused on advancing formal and informal PK-12 engineering education policies and programs. Curtis also served on the U.S. House of Representatives STEM Education Caucus Steering Committee, the ASTC Public Policy Committee, and the Title IV, Part A Coalition Steering Committee. Previously, she was a government relations representative for the American Society of Mechanical Engineers and served as a leader of the STEM Education Coalition.

Originally from Rochester, NY, Curtis received her B.A. in Political Science and her M.P.A. at the University of South Carolina. She worked for the S.C. state legislature and the state Department of Parks, Recreation and Tourism. She also studied political affairs at George Washington University and enjoys travel and watercolor painting.

Nav Deol-Johnson is the National Program Operations Manager for Imagine Science. Prior to Bolster Mission, Nav was the Project Manager for Imagine Science Orange County and also served as the Evaluation Consultant for Girls Inc. of Orange County. Nav began her career as a summer camp counselor at UCLA UniCamp and has held a variety of positions with non-profit organizations supporting underserved youth and families in Baltimore, Los Angeles and Orange County, CA. Nav currently lives in Long Beach, CA. She has a master's degree in Social Work (Administration & Planning) from the University of Texas at Austin and received her bachelor's degrees in English and Sociology from UCLA.





Ellen Dickenson is United Way of Massachusetts Bay and Merrimack Valley's Vice President of Analytics, overseeing the organization's business analytics function and its partnerships with researchers and evaluators to monitor and scale its impact in the community. One such research project is the US Department of Education-funded study of BoSTEM, United Way's initiative to boost Boston middle schoolers' interest and achievement in STEM through a coordinated approach to integrating STEM, SED, and career exploration in out-of-school time learning settings. Prior to joining United Way, Ellen was the Director of Partnerships & STEM at Boston After School & Beyond, where she implemented citywide initiatives to promote social-emotional learning and STEM skill development through school-community partnerships. Ellen's career started in MIT's Biology Department researching the role of telomeres in cell biology, while working on the side at the Museum of Science, Boston, teaching workshops for elementary school students. She started focusing full time on youth development when she moved from the lab to managing MIT's InvenTeams national high school invention grants program. She earned her B.Sc. in Biology from McGill University and her M.B.A. from UMass Amherst's Isenberg School of Management.

Christopher Harris is the Director of Science and Engineering Education Research within WestEd's STEM program in Redwood City, California. His research focuses on the design and study of educational innovations that support science teaching and learning in PK-12 classrooms and informal settings. At WestEd, he leads large-scale multiyear, multi-institutional research, development, and evaluation projects and has been involved in developing scalable approaches to address the Next Generation Science Standards (NGSS) through curricula and assessments that help teachers make learning engaging, interactive, and accessible for students of diverse backgrounds and abilities. His recent work related to STEM and SED has focused on the design and study of a professional learning model with resources for middle school science teachers to support and sustain students' motivation and engagement with the ambitious learning called for in the NGSS. Dr. Harris' recent publications have addressed science curriculum and assessment, design-based implementation research, science teaching practice, educational innovation, and the role of project-based learning in STEM. Prior to joining WestEd, he was Director of Research for Science and Engineering Education within the Center for Technology in Learning at SRI International. He completed his doctoral work at the University of Michigan.

Kathy Haynie is the Director of Haynie Research and Evaluation, specializing in STEM educational evaluation and research with an emphasis on K-16 computer science education, science education, math education, educational assessment, and STEM classroom implementation. She started Haynie Research and Evaluation in 2002; prior to that, she worked for Educational Testing Service for nearly a decade. She has taught courses at Rutgers University, San Jose State University, and Dominican College. Dr. Haynie received her Ph.D. in educational psychology from Stanford University, her M.Ed. in educational statistics and measurement from Rutgers University, and her B.A. in mathematics and music from Oberlin College. She has 30+ years of experience in educational research and evaluation.







Margaret Honey, as President and CEO of the New York Hall of Science (NYSCI), is committed to using the museum as a platform through which it can nurture a generation of creative and collaborative problem solvers in science, technology, engineering, and math fields. Under her leadership NYSCI has developed its Design-Make-Play approach to STEM learning and engagement. A graduate of Hampshire College, with a doctorate in developmental psychology from Columbia University, Dr. Honey has shared what she's learned before Congress, state legislatures, and federal panels, and through numerous articles, chapters, and books. She currently serves as a member of the National Science Foundation's Education and Human Resources Advisory Committee, and the National Academies Division of Behavioral, Social Sciences and Education Advisory Committee. She also serves on the boards of Bank Street College of Education, the Scratch Foundation, and the Concord Consortium.

Ashley Hunt is an IES Pre-Doctoral Fellow at the University of Virginia, Curry School of Education in Educational Psychology: Applied Developmental Science. She researches the intersection of social, emotional, and academic development, with a focus on elementary STEM. She takes an interdisciplinary and methodologically diverse approach to investigating how schools can better support student and educator well-being and success. Her dissertation describes an instructional model that connects the abstract concept of "inquiry learning" to explicit classroom conditions with the goal of helping educators cultivate socially supportive, equitable learning environments that motivate students towards future engagement with real-world STEM problems and careers.

Ashley Iveland is a Research Associate in the Science, Technology, Engineering, and Mathematics (STEM) Program at WestEd. Dr. Iveland is the co-PI and project director for a \$1.5M NSF-funded study investigating middle-school teachers' enactment of the Next Generation Science Standards (NGSS) across the state of California. She co-leads implementation research and coordinates project activities with participating districts on two large-scale studies of NGSS-aligned curricula in elementary and middle school. She also evaluates professional learning, teacher leadership, and support structures for K-8 teachers' implementation of the NGSS. Prior to coming to WestEd, Dr. Iveland worked in the department of Education and the Givertz Graduate school of Education at the University of California, Santa Barbara (where she received her undergraduate and graduate degrees as well as her teaching credential in secondary science) doing research in STEM education and teaching undergraduate and graduate courses. Specifically, her M.A. and Ph.D. focused on conceptions of engineering design in elementary and middle school students and individuals along the learning-to-teach continuum, respectively.

Gemma Lenowitz is an associate program officer of the Inspired Minds portfolio at Overdeck Family Foundation, and evaluates and supports the foundation's investments in OST STEM. She is a former high school STEM coordinator, Brain Insight teacher scholar, and Teach for America Corps member. She holds a BA in Cognitive Science from the University of Pennsylvania, and a Masters in Teaching from Fordham University focused on exceptional adolescents in grades 7-12.







ChangChia-James Liu's work focuses on learning motivation in informal education. His recent projects include developing and evaluating STEM-related programs, curriculums, and activities for children and their families, investigating children's goals and motivation in engineering activities, and conducting research on museum educators and their professional development. Dr. Liu holds a Ph.D. in educational psychology from Purdue University and two master's degrees from the City College of New York in museum studies and psychology. He is Senior Research Associate at the New York Hall of Science.

Miriam Lund is the Group Leader for the 21st Century Community Learning Centers Grant program at the U. S. Department of Education, Office of Elementary and Secondary Education in the Office of Formula Grants. Her primary responsibilities are centered on "all things" afterschool. Miriam works with four outstanding program officers as they assist states implementing approved state Nita M. Lowey 21st Century Community Learning Centers grants.

Prior to coming to the Department Miriam was a middle school teacher with content expertise in mathematics, science, reading (literacy) and gifted education in Florida, New Mexico and Texas. She has extensive teaching experience and worked with math, science and reading afterschool programs in all three states as an "impact" teacher - - having an immediate, positive, powerful influence on each school and community. In addition to being Nationally Board-Certified Teacher in Early Adolescent/Generalist and three times Teacher of the Year at the schools she taught in, she was certified in ten content areas in three states. Mrs. Lund received her Master of Arts in secondary education and literacy from the University of New Mexico where she graduated with distinction. She is a magna cum laude graduate of the University of West Florida with a degree in Middle School Mathematics and Science.

In her leisure time she enjoys being with her family, supporting her grandchildren at their sporting events, traveling, and reading.

Tyrone Martinez-Black is a former teacher of middle school math and science, an instructional coach for those subjects, and an assistant director of mathematics curriculum. In addition, he has designed and delivered professional learning in the Chicago metropolitan area and across the nation. Especially applicable to his work at CASEL, Tyrone has been a member of projects addressing youth development, design thinking within schools, and integrating SEL competencies with the Common Core Standards for Mathematical Practice.

His primary responsibilities include developing and fostering connections between and among district and state teams and with external partners to better understand strategies for leveraging SEL to advance educational equity. Tyrone devotes special attention to integrating SEL across academic content areas and to improving the engagement of families in SEL initiatives and participatory evaluation.

Tyrone has a bachelor's degree from the Illinois Institute of Art and two master's degrees in education from the University of Illinois. He lives in his childhood home with his loving family and strives to make every encounter an edifying one.





Jennie Mathur is the Senior Learning Manager for STEM at Girls Inc. For the last 12 years she has developed, piloted, and assessed STEM curricula for Girls Inc. girls ages 6-18. Since the 1980's, Girls Inc. STEM programming has focused on getting girls excited about STEM through hands-on, participatory experiences that expose them to STEM role models and jobs in non-traditional fields. Jennie has focused primarily on bringing innovative STEM programs to Girls Inc. and helping affiliates across the country leverage their local resources to provide relevant STEM experiences for their girls.

Dawn McDaniel is affiliated with Harvard Medical School and an Evaluation Consultant at Quality for Youth, LLC, which helps youth-serving organizations increase the evidence-base of their programs. Dawn received her Ph.D. in Child Clinical Psychology from the University of Southern California and completed a fellowship in Applied Epidemiology at the Centers for Disease Control and Prevention (CDC). She has worked with organizations, such as the Boys & Girls Clubs of America, Outward Bound USA, the PEAR Institute, and the World Bank Group's Gender and Innovation Lab to refine their social and emotional development programs, strategies and assessments and assist with large-scale implementation and dissemination of practices, tools, and programs.

Eileen Merritt is transitioning from Arizona State University to Virginia Tech this summer. Prior to entering academia, she worked as a teacher, a natural history camp director, and education coordinator for a natural history museum. Most of Eileen's current research is at the intersection of science learning and SEL. She was a co-PI on an IES grant to develop Connect Science, an environmental service-learning curriculum and professional development program for educators that combined science, SEL and service-learning.

Eileen is a co-PI on a National Science Foundation DRK12 conference grant focused on Garden-Based Science Teaching. The conference focused on teaching practices that build on traditional ecological knowledge and further develop students' sense of place in their communities. Also, she recently completed a study that focused on the academic and emotional benefits of nature journaling in school gardens.

In her new role at Virginia Tech, Eileen will collaborate with Marc Stern and Bob Powell to build a learning network of environmental education (EE) organizations who strive to improve practices that lead to better outcomes in EE based on the EE21 assessment tool. The field of EE strives to integrate social, emotional and academic learning in their work with students.





Pendred Noyce is a retired internist, children's book author, publisher, and advocate of STEM education, especially informal and afterschool science education. She studied biochemistry at Harvard and medicine at Stanford. After a residency in internal medicine in Minnesota, she practiced at the East Boston Neighborhood Health Center and later at Newton-Wellesley Hospital before leaving medicine after the birth of her fifth child. Penny was a founding trustee of the Robert N. Noyce Foundation, which for 25 years supported innovation in math and science education nationwide, with an emphasis on afterschool opportunities for young people in grades K-8. For nine years, she also helped lead the NSF State Systemic Initiative in Massachusetts, and more recently she served a term on the Massachusetts Board of Elementary and Secondary Education.

In 2007, Penny began writing fiction and non-fiction for middle grade and sometimes high school students, usually with a focus on science. Three of her twelve published books have won Outstanding Science Trade Books awards from NSTA and the Children's Book Council. Penny has served on the boards of multiple education-related nonprofits, including the Concord Consortium, COMAP, the Gullf of Maine Research Institute, TERC, the Rennie Center, and the Radcliffe Institute of Advanced Study. Currently she chairs Maine's Libra Foundation and STEM Next, which supports afterschool STEM Education.

Ron Ottinger, a national leader and expert in STEM learning, is known for his expertise in informal and out-of-school time STEM education and in building collaborations among schools, science centers, communities and afterschool programs that increase STEM learning opportunities for young people. Ron is Executive Director of STEM Next and served as past co-chair of the national STEM Funders Network. Additionally, Ron is the co-chair for the National STEM Learning Ecosystem Initiative. As the Executive Editor of STEM Ready America, Ron convened the nation's leading STEM experts presenting bold and persuasive evidence—as well as real-world examples of effective practices, programs, and partnerships on how science, technology, engineering and mathematics knowledge and skills are preparing young people to be successful in school today and the workforce tomorrow. For the past nine years, he led the Noyce Foundation which for a quarter-century was dedicated to helping young people become curious, thoughtful, and engaged learners. Prior to joining Noyce, Ron served for fourteen years as National Associate Director of the non-profit AVID Center. He was elected to three terms on the San Diego City Schools' Board of Education from 1992-2004, during a period of major reform of the school system, and was the longest running board president.

Jason Ravitz is an evaluation and research professional with 25+ years experience driving strategy, implementation, insights and impact measurement for educational pioneers. He started as a social studies and computer teacher before joining the National School Network project at BBN Educational Technologies and pursuing a Ph.D. in Instructional Design, Development and Evaluation. This led to a career conducting state and national studies and creating tools and strategies for teaching and learning programs. Jason has produced research on project-based learning and 21st century teaching for the Buck Institute for Education; on evaluation capacity building and STEM-CS education for Google; and on school coaching for Digital Promise. He has a B.A. from Harvard College, a Ph.D, from Syracuse University, and completed postdoctoral positions at UC, Irvine and UC, Berkeley/SRI International.







Sara Rimm-Kaufman is a Professor of Education at the University of Virginia. She and her team have been conducting research on social and emotional learning (SEL) in classrooms for two decades. Recently, her work has focused on the integration of SEL in math and science. One line of research examines the ways that teacher-student interactions supports student engagement and learning in math. Another line focuses on the development and evaluation of a program, Connect Science, that integrates NGSS curriculum with SEL and service-learning. Yet another examines the efficacy of programs that are explicitly designed to leverage SEL in academic instruction (e.g., EL Education). Rimm-Kaufman has received funding from Institute of Education Sciences, NSF and foundations for such research. She views two aspects of the work as most challenging. First, SEL and STEM fields tend to be isolated– it's rare to find experts in both, in research but also in practice where schools may have SEL specialists and math specialists with little connection in vision or work. Second, the gap between what we know and what educators use is too great. When we see exemplars of SEL+STEM integrated practice, they seldom fit easily into the structure of U.S. schools.

Shawna Rosenzweig is Chief Strategy Officer at Camp Fire National Headquarters. She has spent nearly two decades working in Positive Youth Development, from the Middle East to Sesame Street. Previously, she worked at Thrive Foundation for Youth and at Global Kids. Shawna has also developed educational programs for young people living in regions in conflict. In her current role as Chief Strategy Officer, she is responsible for development and implementation of Camp Fire's strategic initiatives, manages affiliate support services, diversity and inclusion, evaluation and professional development. Shawna holds a Master's Degree in Curriculum & Instruction at University of Wisconsin-Madison and a B.A. in Sociology from University of California Santa Barbara.

Leah Silverberg joined the Afterschool Alliance team in January 2017 and works on the STEM and field outreach initiatives. During their time at the Afterschool Alliance, Leah has supported work with the Afterschool STEM Hub, state-level policy work, and the Americorps VISTA project. Before coming to the Afterschool Alliance, Leah spent time working for their college's science literacy program and has had experience working for STEM afterschool programs through the Maker Education Initiatives Maker Corps program. Leah graduated from Bard College with a B.A. in Biology and Studio Art.

Chris Smith has created, scaled, and led cross-sector partnerships in education and workforce development over the past two decades. Under his leadership, Boston After School & Beyond has developed a nationally recognized model of summer learning that improves student outcomes, built a citywide program performance measurement system, and cultivated a network of 150 programs serving more than 15,000 students. Previously Chris worked at the Boston Private Industry Council, where he collaborated with business leaders to integrate work and learning in order to help thousands of students graduate, with universities on Boston's first-ever study of college graduation rates of Boston Public Schools students, and with legislative leaders to address the dropout rate in Massachusetts. Chris began his career at the US Department of Education in Washington, DC, where he coordinated partnerships for the Secretary of Education. A native of Worcester, MA, Chris earned a BA in American Studies from Trinity College in Hartford, CT and an MBA from Babson College in Wellesley, MA.











Debora Southwell serves as a federal program officer within the U.S. Department of Education's Office of Elementary and Secondary Education's (OESE) Innovation and Early Learning Programs (IELP) team. Prior to joining the i3/EIR team, she worked for four years in the Department's Office of Non-Pubic Education. Before coming to the Department, Debora served as a mathematics specialist/coach striving to improve the caliber of teachers' mathematics knowledge and pedagogy. She taught for over twenty years in private, public, international and charter schools in pre-kindergarten through high school. Debora earned two undergraduate degrees from Boston College and a master's degree from the Graduate School of Education at Harvard University.

Cary Sneider is a Visiting Scholar at Portland State University in Portland, Oregon, where until recently he taught research methodology in a Master of Science Teaching program. Dr. Sneider is a consultant on STEM Education for the S.D. Bechtel Jr. Foundation, in support of their STEM initiatives. He was the lead consultant on engineering to the NRC committee that developed *A Framework for K-12 Science Education*, and played a similar role on the writing team for the *Next Generation Science Standards*. From 2011 to 2019 he was a member of the National Assessment Governing Board, which sets policy for the National Assessment of Educational Progress (NAEP), also known as "The Nation's Report Card." Before moving to Oregon Sneider was Vice President for Programs at the Museum of Science in Boston, and prior to that he directed Astronomy and Physics Education at Lawrence Hall of Science, U.C. Berkeley. Sneider earned a BA in Astronomy at Harvard College, and a teaching credential, MA, and PhD in Science Education at UC Berkeley. Sneider has received numerous awards, including the 2018 Robert H. Carleton Award for national leadership in the field of science education, the National Science Teachers Association's highest award for lifetime achievement.

Bela Shah Spooner is the Program Director for Education and Expanded Learning in the Institute for Youth, Education, and Families at the National League of Cities (NLC). For over 15 years, she has worked at NLC helping cities create citywide afterschool and summer learning systems, develop community schools, and impact local, state, and federal policy. Recently, Mrs. Spooner led an initiative that challenged cities to commit to increasing STEM learning opportunities. Bela speaks nationally about expanded learning opportunities as equity strategies to catalyze policy, program, and practice change. In 2019, her portfolio broadened to address postsecondary students' basic needs to support postsecondary and workforce success.

She previously worked for the Coalition for Community Schools at the Institute for Educational Leadership. Bela's early career includes various education policy positions at the Center for Educational Opportunity & Innovation, the Institute for Education & Government, and the National Center for Children and Families at Teachers College.

Bela holds her Master's degree in Sociology and Education with a concentration in Education Policy from Teachers College, Columbia University and her Bachelor's degree in Psychology and Spanish from the University of Pennsylvania.









Tony Streit is the Principal Investigator for the National Center on Afterschool and Summer Enrichment (NCASE), providing technical assistance to state agencies and other stakeholders to ensure that school-age children can access high-quality out-of-school experiences that promote their development and academic achievement. Streit is a nationally recognized expert in out-ofschool time, youth development, media education, and informal STEM learning. Streit is a Managing Project Director at Education Development Center, Inc. (EDC), an international nonprofit organization that designs, implements, and evaluates programs to improve education, health, and economic opportunity worldwide. Streit also serves as the Director of the EDC Chicago office. Since 2002, Streit has directed a broad array of research, promising practices, and curricular strategies on community-based, contextual learning. Streit and his team provide professional development, program materials, research, evaluation, and technical assistance to organizations and educators in both formal and non-formal settings. Funders and clients include Adobe Systems, Mott Foundation, Open Society, and the National Science Foundation. Before joining EDC, Streit was Co-Founder and Co-Director of Street-Level Youth Media, a celebrated Chicago organization recognized for its innovative approach to youth development and digital learning. Streit currently serves as Board President of the National Association for Media Literacy Education (NAMLE).

Joy Thompson is a Research Scientist in the Education and Early Childhood research areas at Child Trends. Her interests center around students' pathways into STEM fields and contextual supports for equity and access in education, especially for students who are underserved. Most recently, she completed her doctoral degree in Applied Developmental Psychology, where her dissertation focused on the role of motivational and contextual factors in advanced math course enrollment in high school, which is associated with entry and persistence in STEM fields. She also led a case study of how afterschool programs integrated STEM programming into their youth development programs. Dr. Thompson is interested in understanding the availability and impact of academic, social, and emotional supports for students along the STEM pathway in K-12 and postsecondary education.

Saskia Traill, prior to leading policy and research efforts at ExpandED Schools, worked to build state systems for early care and education. She has authored and co-authored articles for peer-reviewed journals, policy briefs, reports on a range of issues, and an essay on voter registration in a book about civic service (which included being recorded on a CD with Al Gore). Saskia earned a BA from Columbia University and a PhD in research psychology from Stanford University, and credits winning the Baltimore Science Fair in middle school with bolstering her love of science. She currently enjoys passing along that love of science to her twins.





Burr Tyler, a Research Associate in the Science, Technology, Engineering and Mathematics Program at WestEd, works primarily on evaluations in the areas of science and mathematics education and teacher preparation. She is currently the project director of the six-year CA K-8 NGSS Early Implementers Initiative evaluation, funded by the SD Bechtel Jr Foundation. In this capacity, she has attended many NGSS professional learning events, observed dozens of NGSS lessons, and interviewed many teachers and administrators with varying degrees of NGSS training. She has authored Early Implementer evaluation reports on the impact of NGSS instruction on students, the power of integrating the NGSS with ELA, and teacher leadership in districtwide NGSS implementation.

Burr has also worked extensively in K-12 assessment and standards development, particularly in the areas of career preparation and mental/emotional wellness. She holds a master's degree in Education, with an emphasis in Program Evaluation.

Keisha Varma is an Associate Professor in the Department of Educational Psychology and Associate Vice Provost in the Office for Equity and Diversity at the University of Minnesota. Dr. Varma leads the NSF-funded Fostering Equity in Science through Parent Involvement and Technology (ESPRIT) Project. ESPRIT focuses on increasing minority and immigrant parent involvement to support middle school science learning. In this project, teachers use a videobased, online social learning environment (Flipgrid ™) to assign questions and activities for students and parents to complete together. Then teachers use the responses to create culturally responsive science lessons. In the ESPRIT Project, teachers have an innovative method of instruction and a new tool for cultivating home-school partnerships centered on academics. Students have a method of engaging in scientific practices that are relevant to their everyday experiences, and parents have a new avenue for contributing to their child's science learning. The overall research goal is to create connected learning experiences for teachers, students, and families. Dr. Varma also leads an NSF LSAMP Project, the North Star STEM Alliance, that focuses on helping undergraduate STEM majors to persist and thrive by creating holistic programming that includes academic guidance, mentoring, and social-emotional support.

Jamaal Young focuses his attention on culturally responsive mathematics teaching, particularly related to the educational needs of African American children, multicultural STEM project-based learning, preparation of pre-service mathematics teachers to work with diverse learners, and literature synthesis and meta-analysis methodology. Dr. Young currently seeks to examine the instructional factors that contribute to the success of children of color in STEM content areas.







