

The National Academies of
SCIENCES • ENGINEERING • MEDICINE

Committee on Operationalizing Sustainable Development

Information Gathering Workshop 1: Local Strategies

April 18 and 21, 2022

All times are US Eastern Daylight Time

Open Session Agenda

Workshop Objective: Gather information on positive case studies for operationalizing sustainable development at a local level.

Day 1: Monday, April 18, 2022

- 10:00 am **Opening Remarks and Introductions**
E. William Colglazier, American Association for the Advancement of Science (Co-Chair)
Cherry Murray (NAS/NAE), University of Arizona (Co-Chair)
Franklin Carrero-Martínez, National Academies of Sciences, Engineering, and Medicine
- 10:05 am **Panel I: Sustainable and Equitable Food Systems**
Moderator: Alfred Watkins, Global Solutions Summit
- Eduard Müller Castro, University for International Cooperation
 - Alison Grantham, Grow Well Consulting, LLC
 - Sabine O'Hara, University of the District of Columbia
 - Ravi Kanbur, Food System Economics Commission and Cornell University
- 11:25 am BREAK
- 11:40 am **Panel II: Education and Capacity Building**
Moderator: E. William Colglazier, American Association for the Advancement of Science
- Sarah Mendelson, Carnegie Mellon University
 - Carol O'Donnell, Smithsonian Institution
 - Mark McCaffrey, The Long Game
 - Meghna Tare, The University of Texas, Arlington
- 1:00 pm Open Session Adjourns

Day 2: Thursday, April 21, 2022

- 10:00 am **Welcome and Introductions**
E. William Colglazier, American Association for the Advancement of Science (Co-Chair)
Cherry Murray (NAS/NAE), University of Arizona (Co-Chair)
Franklin Carrero-Martínez, National Academies of Sciences, Engineering, and Medicine
- 10:05 am **Panel III: Urbanization**
Moderator: Harini Nagendra, Azim Premji University
- Susan Parnell, University of Cape Town
 - Worajit Setthapun, Chiang Mai Rajabhat University
 - Lykke Leonardsen, City of Copenhagen
 - Marc Weiss, Global Urban Development
- 11:25 am BREAK
- 11:40 am **Panel IV: Localization of the Sustainable Development Goals and Indigenous Knowledge Networks**
Moderator: Cherry Murray (NAS/NAE), University of Arizona
- Emilia Saiz, United Cities and Local Governments
 - Anthony Pipa, Brookings
 - Ashish Kothari, Kalpavriksh
 - Celeste Connors, Hawai'i Green Growth
- 1:00 pm Open Session Adjourns

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Biographies of Speakers and Moderators

Panel I: Sustainable and Equitable Food Systems

ALFRED WATKINS (Committee Members and Moderator) is the Founder and the Chairman of the Global Solutions Summit (GSS), which focuses on innovative business models and financing strategies to promote the large-scale deployment in emerging markets of commercially viable, financially sustainable development solutions for potable water, renewable energy, information and communications technology (ICT), health care, housing, sustainable agriculture, food processing, and manufacturing. Prior to founding GSS, Dr. Watkins worked for more than 23 years at the World Bank and served as the World Bank's Science and Technology Program Coordinator and head of the World Bank's Science, Technology and Innovation Global Expert Team. He has extensive on-the-ground experience leading science, technology, and innovation capacity-building programs and projects in Africa, Asia, and various countries in the Former Soviet Union, including Russia, Ukraine, Kazakhstan, and Latvia. Dr. Watkins organized two World Bank Global Forums on Science, Technology and Innovation Capacity Building for Sustainable Development (one in 2007 and another in 2009). Before joining the World Bank, he also served as a legislative assistant/staff economist in the U.S. Congress and was an assistant professor at the University of Texas at Austin. In March 2017, United Nations (UN) Secretary-General António Guterres appointed him to a 3-year term on the Governing Council of the Technology Bank for the Least Developed Countries (LDCs). In January 2020, the Secretary-General reappointed him to a second 3-year term. The main objective of the Technology Bank, which was formally established by the UN General Assembly in December 2016, is to help LDCs identify and deploy the technology to (1) foster inclusive sustainable growth and (2) achieve the Sustainable Development Goals. Dr. Watkins received his Ph.D. in Economics from the Graduate Faculty of the New School University.

EDUARD MÜLLER CASTRO is the Founder and President of the University for International Cooperation and Chair-holder for the United Nations Educational, Scientific and Cultural Organization (UNESCO). The University for International Cooperation is a global organization of educational innovation for an inclusive knowledge society, seeking a regenerative and evolutionary development to a complex, diverse and changing world. Dr. Müller's career spans over 35 years and he has published more than 50 papers and book chapters. One of his most notable works was a chapter titled "December 22nd," in a book titled Global Chorus. Dr. Müller has spoken for numerous organizations including The Earth Charter, the World Meteorological Organization, and the Latin American Parliament. His greatest achievement thus far has been having over 5000 students from 58 different countries graduate from his University. Dr. Müller attributes his success to his experience living in different countries. Dr. Müller is also an accomplished photographer.

ALISON GRANTHAM is a scientist who brings a methodical, analytical, and quantitative approach to her work with nonprofits, private sector businesses, and foundations to improve our food system through her practice, Grow Well Consulting. Current and recent projects include improving climate impacts of pasture-raised poultry, greenhouse gas, water and waste footprinting for an indoor ag business, a national urban food waste and food insecurity analysis and report, global seafood traceability to support food

safety and sustainability outcomes, and a FLAG sector scope 3 engagement for an international environmental non-governmental organization. Prior to launching Grow Well, she led Food Systems R&D and then Food Procurement at Blue Apron, overseeing food sourcing and procurement and implementing a national program to increase employee access to surplus product, as well as local communities through partnerships with Feeding America. There, she also served on the National Academies' Ad Hoc Reducing Food Loss and Waste Committee. Previously, she led research at the Rodale Institute, including all aspects of organic and sustainable agriculture research. Dr. Grantham holds a dual-title Ph.D. in Ecology and Biogeochemistry from The Pennsylvania State University and B.A. summa cum laude in Biological Sciences and Environmental Studies from Mount Holyoke College.

SABINE O'HARA is Distinguished Professor and Ph.D. Program Director of the College of Agriculture, Urban Sustainability and Environmental Sciences (CAUSES) at the University of the District of Columbia, which is the only public university in Washington, DC and the only exclusively urban Land-grant University in the United States. Prior to her current appointment, she served as the founding Dean of CAUSES and led the University's efforts to build a cutting-edge model for urban agriculture and urban sustainability that integrates training in the agricultural, environmental and health sciences with the practical aspirations of students and residents to embark on successful careers in the green innovation economy. Dr. O'Hara's work has focused consistently on the quality of life and economic opportunity of local communities through multi-dimensional intellectual, social, and physical capacity development. A foundation of her work is her belief that education should not only answer our questions, but also question our answers. This search for new answers has guided her work as the 10th President of Roanoke College in Virginia; provost of Green Mountain College in Vermont; faculty member at Rensselaer Polytechnic Institute, in Troy, New York; and executive director of the Council for International Exchange of Scholars (CIES), which administers the prestigious Fulbright Scholar Program. Dr. O'Hara holds Master's and Doctoral degrees in Agricultural Economics and Environmental Economics from the University of Göttingen, Germany. She holds an Affiliated Faculty appointment with the Working Group on Institutional Analysis of Socio-Ecological Systems at Humboldt University in Berlin, Germany; is the past President of the International Society for Ecological Economics (ISEE) and the U.S. Society for Ecological Economics (USSEE); is a member of the International Advisory Board of King Abdulaziz University in Jeddah; and served on the editorial board of several academic journals.

RAVI KANBUR is T.H. Lee Professor of World Affairs, International Professor of Applied Economics, and Professor of Economics at Cornell University. Dr. Kanbur researches and teaches in development economics, public economics and economic theory. He is well known for his role in policy analysis and engagement in international development. He is Co-Chair of the Food Systems Economics Commission. He has served on the senior staff of the World Bank including as Chief Economist for Africa. Dr. Kanbur has also published in the leading economics journals, including *Journal of Political Economy*, *American Economic Review*, *Review of Economic Studies*, *Journal of Economic Theory*, and *The Economic Journal*. The positions he has held include: Chair of the Board of United Nations University-World Institute for Development Economics Research, member of the Organisation for Economic Co-operation and Development (OECD) High Level Expert Group on the Measurement of Economic Performance, President of the Human Development and Capability Association, President of the Society for the Study of Economic Inequality, member of the High Level Advisory Council of the Climate Justice Dialogue, Co-Chair of the Scientific Council of the International Panel on Social Progress, and member of the Core Group of the Commission on Global Poverty.

Panel II: Education and Capacity Building

E. WILLIAM COLGLAZIER (Committee Co-Chair and Moderator) is Editor-in-Chief of *Science & Diplomacy* and Senior Scholar in the Center for Science Diplomacy at the American Association for the Advancement of Science (AAAS). He served as the fourth Science and Technology Adviser to the Secretary of State from 2011 to 2014. From 1994 to 2011, he was Executive Officer of the National Academy of Sciences and the National Research Council where he helped to oversee the studies that provide independent, objective scientific advice on domestic and international public policy issues. Dr. Colglazier received his Ph.D. in theoretical physics from Caltech in 1971, and prior to 1994 worked at the Stanford Linear Accelerator Center, the Institute for Advanced Study in Princeton, the Center for Science and International Affairs at Harvard's Kennedy School of Government, and the University of Tennessee. He is a past chair of the Forum on Physics and Society and the Committee on International Scientific Affairs of the American Physical Society (APS) and a Fellow of the AAAS and APS. In 2015 he received the Joseph A. Burton Forum Award from the APS for "outstanding contributions to the public understanding or resolution of issues involving the interface of physics and society" and the Order of the Rising Sun, Gold Rays with Neck Ribbon from the Government of Japan for "contributing to science and technology exchange and mutual understanding between Japan and the United States." From 2016 to 2018, Dr. Colglazier served as co-chair of the Ten Member Group appointed by the U.N. Secretary General to advise on science, technology, and innovation for achieving the 17 Sustainable Development Goals of the UN 2030 Agenda.

SARAH MENDELSON is Distinguished Service Professor of Public Policy at Carnegie Mellon University (CMU) and Head of CMU's Heinz College in Washington, DC. Ambassador Mendelson previously served as the U.S. Representative to the Economic and Social Council at the United Nations until January 20, 2017. Confirmed by the Senate in October 2015, she was the USUN (United States Mission to the United Nations) lead on international development, human rights, and humanitarian affairs. There she oversaw campaigns to get country-specific resolutions passed in the General Assembly and to get NGOs, including the Committee to Protect Journalists, accredited to the UN. She led efforts to elevate the issue of combating human trafficking and was senior lead for the President's Summit on Refugees. Prior to her appointment as Ambassador, she served as a Deputy Assistant Administrator at the U.S. Agency for International Development (USAID) from 2010-2014 where she was the Agency lead on democracy, human rights, and governance. A long time policy entrepreneur, she has spent over two decades working on development and human rights as a scholar and practitioner including in Moscow with the National Democratic Institute, on the faculty of the Fletcher School at Tufts University, and over a decade as senior adviser and inaugural director of the Human Rights Initiative at the Center for Strategic and International Studies. There she also worked as a senior fellow in the Russia and Eurasia Program where she oversaw focus groups, public opinion surveys, and social marketing campaigns in Russia on a range of issues. A member of the Council on Foreign Relations and the author of over 70 scholarly and public policy publications, Ambassador Mendelson received her B.A. in History from Yale University and her Ph.D. in political science from Columbia University.

CAROL O'DONNELL is the Senior Executive and Director of the Smithsonian Science Education Center (SSEC), an organization of the Smithsonian Institution dedicated to transforming K-12 Education through Science™ in collaboration with communities across the globe. In her role at the Smithsonian (a non-profit with quasi-governmental status), Dr. O'Donnell serves as the U.S. representative on the Global Council of the InterAcademy Partnership (IAP) Science Education Programme (SEP), an appointment by the U.S. National Academy of Sciences, Engineering, and Medicine; and she serves on the UN Broadband Commission Working Group on School Connectivity: Hybrid Learning. Dr. O'Donnell also represents the Smithsonian on the Subcommittee on Federal Coordination in STEM Education (FC-STEM), which advises and assists the Committee on STEM Education (CoSTEM) of the Office of Science and Technology Policy of the Executive Office of the President. In her role on the Program

Committee for the International Dialogue on STEM Education, Dr. O'Donnell co-authored the position paper on "STEM Education for Sustainable Development" (<http://bit.ly/3a3ObkS>). Prior to joining the Smithsonian, Dr. O'Donnell was a group leader at the U.S. Department of Education, supporting States' and districts' implementation of ESEA programs; she also oversaw the Cognition and Student Learning research grant program of the Institute of Education Sciences (IES). A former K-12 teacher and curriculum developer, Dr. O'Donnell is still in the classroom today, serving on the part-time faculty of the Physics Department at The George Washington University, where she earned her doctorate. Her TedX talk demonstrates her passion for integrating digital and physical interactions in science classrooms.

MARK MCCAFFERY is currently involved with a project called The Long Game, which aims at involving schools around the world in community based climate action projects. Previously, he was founder of the United Nations Climate Change community ECOS (Education, Communication, and Outreach Stakeholders). Having helped establish a local watershed focused network two decades ago (BASIN, the Boulder Area Sustainability Information Network), and a national digital library and online community (CLEAN, the Climate Literacy and Energy Awareness Network), Mr. McCaffery assisted in initiating the climate and energy literacy frameworks and authored Climate Smart & Energy Wise, published in 2014 by Corwin. Relocating from North America to Central Europe to pursue international collaboration and engagement opportunities, he assisted in the launch of the Institute for Sustainable Development in Budapest and has consulted with Climate-KIC, the largest EU public-private partnership focused on climate solutions, and various United Nations organizations, such as FAO and UN CC: Learn. He has previously served as Programs and Policy Director at the National Center for Science Education (NCSE) and Associate Scientist at CIRES, the Cooperative Institute for Research in Environmental Sciences at the University of Colorado at Boulder, where he developed climate change and energy literacy education programs.

MEGHNA TARE is the first Chief Sustainability Officer for The University of Texas, Arlington (UTA). Ms. Tare works collaboratively to foster partnerships among academic, research, and operational departments at UTA, and to address opportunities to promote sustainability in several areas energy efficiency, resource conservation, waste management, transportation, education, outreach, community engagement, supporting and encouraging student initiatives, and implementing an interdisciplinary and sustainability-focused curriculum. Ms. Tare serves and represent UTA on several Advisory Boards including the National Academy of Science Board on Higher Education and Workforce Development—Policy and Global Affairs, Association for the Advancement of Sustainability in Higher Education (AASHE), Local Government for Sustainability (ICLEI), and is a Fellow at Hunt Institute for Engineering and Humanity at Southern Methodist University. She has also served on the Advisory Committee for the City of Dallas Environmental and Climate Action Plan (CECAP), National Academy of Sciences Airport Cooperative Research Program (ACRP) panel, and the Water Resource Council of North Central Texas Council of Governments (NCTCOG). She has spearheaded launching a Regional Center of Expertise for Education in Sustainable Development Goals (SDGs) in North Texas, a program of the United Nations University, and the Institute for Sustainability and Global Impact at UT Arlington. She is a Tedx Speaker, was featured as the Women in CSR by Triple Pundit, awarded Women of the Decade in Corporate Social Responsibility by the Women Economic Forum and 2020 Women in Sustainability - Transformational Leader by Wells Fargo. Ms. Tare graduated with an M.B.A. in Sustainable Management, M.S. in Environmental Science, and M.S. in Chemistry.

Panel III: Urbanization

HARINI NAGENDRA (Committee Member and Moderator) is Director, Research Centre and Professor and Lead, Centre for Climate Change and Sustainability at Azim Premji University. Over the past 25 years, she has been at the leading edge of research examining conservation in forests and cities of South Asia from the perspective of both landscape ecology and social justice. For her interdisciplinary research and practice, she has received a number of awards including the 2009 Cozzarelli Prize from the U.S. National Academy of Sciences (with Elinor Ostrom), the 2013 Elinor Ostrom Senior Scholar award, and the 2017 Clarivate Web of Science award. Her publications include the books “Nature in the City: Bengaluru in the Past, Present and Future” (Oxford University Press, 2016) and “Cities and Canopies: Trees in Indian Cities” (Penguin, 2019, with Seema Mundoli) and over 150 peer reviewed publications, including in *PNAS (Proceedings of the National Academy of Sciences of the United States of America)*, *Nature*, *Nature Sustainability*, and *Science*. Professor Nagendra writes a monthly column ‘The Green Goblin’ in the Deccan Herald newspaper, and is a well known public speaker and writer on issues of urban sustainability in India. She is also the author of a historical mystery fiction series set in 1920s colonial Bangalore. Professor Nagendra has been a Lead Author on the Fifth Assessment Report (AR5) of the United Nations Intergovernmental Panel on Climate Change (IPCC), and is a past Science Committee member of DIVERSITAS and the Global Land Programme. She is an Associate Editor of *Global Environmental Change*, on the Advisory Board of the World Resources Institute Ross Centre for Sustainable Cities, and the European Institute of Technology’s Climate Knowledge and Innovation Centre, and engages with international science and policy through her involvement as a Steering Committee member of the Future Earth Programme for Ecosystem Change and Society, and the Future Earth Urban Knowledge Advisory Network.

SUSAN PARNELL is a Global Challenges Research Professor in the School of Geography at the University of Bristol and Emeritus Professor at the African Centre for Cities at the University of Cape Town. She has held previous academic positions at Wits University and the University of London. She was a Leverhulme Visiting Professor at University College London in 2011/2, Emeka Anyaoku Visiting Chair University College London in 2014/15 and Visiting Professor at LSE (London School of Economics and Political Science) Cities in 2017/18. She has been actively involved in local, national and global urban policy debates around the 2030 Sustainable Development Goals and is an advocate for better science policy engagement on cities. She is the author of numerous peer-reviewed publications that document how cities, past and present, respond to policy change. Her most recent books include the co-authored *Building a Capable State: Post Apartheid Service Delivery* (Zed, 2017) and the co-edited *The Urban Planet* (Cambridge, 2018). Dr. Parnell is currently on the Board of the International Institute for environment and Development (IIED) and serves as a member of the African Centre for Cities Advisory Board and had previously served on several NGO structures.

WORAJIT SETTHAPUN is the founder and currently the Dean of the Asian Development College for Community Economy and Technology (adiCET), Chiang Mai Rajabhat University. adiCET was established in facilitates sustainable development of the local community. Dr. Setthapun established and managed the Chiang Mai World Green City (CMGC) as the living laboratory for renewable energy and green technologies developed from over 70 sustainable energy/environment projects. CMGC focuses on the implementation of Community Power for small rural communities. The aim is to develop an affordable/appropriate sustainable energy system to enhance the livelihood and occupation of the community. Dr. Setthapun is the head of the Graduate Program in Community Energy and Environment and oversees the Renewable Energy Research and Training Center in CMGC. adiCET have the experience to organize and co-organized 22 conference/workshops over the past 10 years. Dr. Setthapun has created short course and training programs which trained over 5,000 participants regarding to community sustainable development, renewable energy, energy and environmental conservation, and sufficiency economy concept. Dr. Setthapun was the ASEAN (Association of Southeast Asian Nations)-

U.S. Science and Technology Fellow and worked at the Ministry of Energy, Thailand on the Thailand's Decentralized Community Power Project. In addition, Dr. Setthapun as the recipient of 2016 ASEAN-US Women in Science Award for thematic area of sustainable energy.

LYKKE LEONARDBSEN is the program director for Resilient and Sustainable City Solutions for the City of Copenhagen in Copenhagen, Denmark. She has more than 25 years of experience in various fields of urban development. This includes local regeneration projects, international urban policies, and communication. Since 2008 she has worked for the Technical and Environmental Administration in charge of making Copenhagen more blue and green—in charge of water management and green infrastructure planning. It was as part of this work that the city's Climate Change Adaptation plan was developed. She was the key driver for the work on climate change adaptation, the development of the adaptation plan and the cloudburst management plan, and the first steps towards a storm surge plan in Copenhagen and is currently focusing on sharing her city's climate results with other cities around the world.

MARC A. WEISS is Chairman and CEO of Global Urban Development (GUD), an international policy organization and professional network of more than 700 leaders and experts 60 countries. He is a Lead Partner of the UN-Habitat World Urban Campaign, Board Member of IHC Global, and International Visiting Professor at the Federal University of Rio Grande do Sul (UFRGS) in Porto Alegre, Brazil, where he coordinates the Porto Alegre Sustainable Innovation Zone (ZISPOA). He previously served as: Public Policy Scholar and Editor of Global Outlook at the Smithsonian Institution's Wilson Center; Coordinator of the 1998 Strategic Economic Development Plan for Washington, DC and Chairman of the NoMa Metro Station Corporation; Special Assistant to the Secretary of the U.S. Department of Housing and Urban Development (HUD) and HUD Liaison to the President's Council on Sustainable Development in the Clinton Administration; Associate Professor and Director of the Real Estate Development Research Center, Acting Director of the Ph.D. Program in Urban Planning, and Adjunct Professor of International and Public Affairs at Columbia University; and Deputy Director of the California Commission on Industrial Innovation. He is author or co-author of many books, articles, and reports, including *The Rise of the Community Builders*, and *Real Estate Development Principles and Process*. He has been a senior adviser on Metropolitan Economic Strategy, Sustainable Innovation, and Inclusive Prosperity for cities, counties, regions, and states/provinces throughout the world, including Australia, Brazil, Canada, China, Czech Republic, Germany, India, Italy, Morocco, Panama, Singapore, South Africa, Spain, Sweden, UK, US, and Virgin Islands. He earned an MCP and Ph.D. in City and Regional Planning from the University of California, Berkeley, and a B.A. with Honors in Political Science from Stanford University, plus he attended the London School of Economics.

Panel IV: Localization of the Sustainable Development Goals and Indigenous Knowledge Networks

CHERRY MURRAY (NAS/NAE) (Committee Co-Chair and Moderator) is Professor of Physics and Deputy Director for Research, Biosphere 2 at The University of Arizona. Her current research interests include policy, research, development, education and innovation to sustain human civilization on future Earth. From 1978 to 2004, Dr. Murray held a number of research positions, which culminated in the Senior Vice Presidency of Physical and Wireless Research, at Bell Laboratories, Lucent Technologies, formerly AT&T Bell Laboratories and previously Bell Telephone Laboratories, Inc. She then served at Lawrence Livermore National Laboratory as Deputy Director for Science and Technology from 2004 to 2007, and as Principal Associate Director for Science and Technology from 2007 to 2009. She was dean of Harvard University's School of Engineering and Applied Sciences from 2009 to 2014. Dr. Murray served as the Director of the U.S. Department of Energy's Office of Science from 2015 until 2017. She served as president of the American Physical Society in 2009, on the National Commission on BP Deepwater Horizon Oil Spill and Offshore Drilling in 2010, has served on numerous National and

American Academy, American Association for the Advancement of Science, American Physical Society, Department of Energy and Department of Commerce committees, and currently serves as chair of the board of the Okinawa Institute of Science and Technology Graduate University and as a director of the American Academy of Arts and Sciences. In 2019, she was elected, representing the U.S. National Academy of Sciences, as co-chair for science of the Inter Academy Partnership, a partnership of over 140 national and regional science, engineering and medical academies dedicated to providing independent and credible advice to policy makers and to strengthening the role of academies nationally, regionally and globally. In 2021 she was appointed co-chair of the Ten Member Group of the Technology Facilitation Mechanism of the United Nations. Dr. Murray received her B.S. and Ph.D. in Physics from the Massachusetts Institute of Technology.

EMILIA SÁIZ is Secretary General of United Cities and Local Governments (UCLG). Ms. Saiz is a jurist by profession and has devoted its professional life to promoting the role of local governments in development as well as fostering relations between cities and their associations worldwide. She started her journey as local government international advocate in the founding organization of UCLG, IULA (International Union of Local Authorities) in 1997. She has led programmes dedicated to institutional capacity building and decentralized cooperation. She has actively promoted women empowerment, social inclusion and international partnerships. She played a critical role in setting up the Global Taskforce of Local and Regional Governments and has followed and represented local and regional governments in iconic international processes such as the Rio and Beijing + 20 as well the Climate Agreement the SDGs and Habitat III. She has further been deeply involved in the institutional development of United Cities and Local Governments into a network of networks. During her work in the World Organization she has been appointed to numerous panels both in her personal and professional capacity. Ms. Saiz has also been involved in Cities Alliance, the General Alliance of Partners and the Cities Programme of the Global Compact.

ANTHONY PIPA is a senior fellow in the Center for Sustainable Development, housed in the Global Economy and Development program at Brookings. He studies place-based policies to improve social progress in the United States and globally, including through use of the SDGs at the local level. He is also considering the future of U.S. multilateral aid and the applicability of lessons from international development to improving rural development in the U.S. Mr. Pipa has over 25 years of executive experience in the philanthropic and public sectors addressing poverty and advancing inclusive economic development. During the Obama administration, he served as chief strategy officer at the U.S. Agency for International Development and held multiple senior policy positions at the Agency. He served as U.S. special coordinator for the Post-2015 Agenda at the Department of State, leading the U.S. delegation at the U.N. to negotiate and adopt the SDGs. Prior to his government service, he directed the NGO Leaders Forum at Harvard University and was the founding CEO of the Warner Foundation, a family foundation in North Carolina focused on improving economic opportunity and race relations. He helped launch Foundation for Louisiana in the aftermath of Hurricane Katrina, and has played a principal role in the start-up of several philanthropic ventures focused on addressing poverty and improving distressed communities. He serves on the board of directors of StriveTogether and the Advisory Council of the Center for Disaster Philanthropy. He has published articles, book chapters, and opinion pieces on local implementation of the SDGs, the effectiveness of place-based policies, multilateral aid, philanthropic effectiveness, financial innovations, and policies to strengthen resilience and prosperity. He attended Stanford University, was graduated from Duke University, and earned a Master of Public Administration at the Harvard Kennedy School.

ASHISH KOTHARI is the founder of Kalpavriksh, an Indian nonprofit organization working on environmental and social issues at local, national and global levels. A graduate in Sociology, Mr. Kothari has taught environment at the Indian Institute of Public Administration in the 1990s and has been guest faculty at several universities, institutes, and colleges. He has served on the Board of Directors of

Greenpeace International and Greenpeace India. Mr. Kothari has served on the Indian Government's Environmental Appraisal Committee on River Valley Projects, and Expert Committees to formulate India's Biological Diversity Act and National Wildlife Action Plan. He coordinated India's National Biodiversity Strategy and Action Plan process, and was co-coordinator of the Activist-Academic Co-Generation of Knowledge on Environmental Justice (www.acknowledgej.org) global project. Mr. Kothari has been active with a number of people's movements, including Narmada Bachao Andolan (Save Narmada Movement) and Beej Bachao Andolan (Save the Seeds Movement). He helps coordinate the Vikalp Sangam (Alternatives Confluence, www.vikalpsangam.org) process in India and the Global Tapestry of Alternatives globally (<https://globaltapestryofalternatives.org>). He helps run the website and associated list of Radical Ecological Democracy (www.radicalecologicaldemocracy.org). Mr. Kothari is the author or editor of over 30 books (including *Churning the Earth: Making of Global India*; *Alternative Futures: India Unshackled*; and *Pluriverse: A Post-Development Dictionary*), and over 400 articles.

CELESTE CONNORS is the Executive Director of Hawai'i Green Growth. Ms. Connors has twenty years of experience working at the intersection of economic, environment, energy, and international development policy. Before joining Hawai'i Green Growth, she was CEO and co-founder of cdots development LLC, which works to build resilient infrastructure systems and services in vulnerable communities. Ms. Connors previously served as the Director for Environment and Climate Change at the National Security Council and National Economic Council in the White House where she helped shape the Administration's climate and energy policies, including the SDGs. Prior to joining the White House, Ms. Connors served as a diplomat in Saudi Arabia, Greece, and Germany. She also held positions at the U.S. Mission to the UN, served as the Climate and Energy Advisor to the Under Secretary for Democracy and Global Affairs at the U.S. Department of State, and worked for City of New York. Ms. Connors is a Senior Adjunct Fellow at the East-West Center and was a faculty member at the Johns Hopkins University School of Advanced International Studies (SAIS) in the Energy, Resources and Environment Program. She holds an M.S.c. in Development Studies from the University of London's School of Oriental and African Studies (SOAS) and a B.A. in International Relations from Tufts University. Ms. Connors has served on numerous boards including her current service on Hawaiian Electric Industries, the Global Island Partnership (GLISPA), the Institute for Sustainability and Resilience at the University of Hawaii and Icebreaker One. She previously served on the Board of America's Service Commissions, the IUCN World Conservation Congress National Host Committee, and was a Term Member on the Council on Foreign Relations.