

# SOUTHEAST ENERGY STORAGE WORKSHOP SERIES

Presented by the DOE Office of Electricity Energy Storage Program, Southern Research, Sandia National Laboratories, and Oak Ridge National Laboratory.

## Session 4: Energy Storage as Generation, Transmission and Distribution; Regulators

Tuesday, May 17, 2022

1:00 PM – 3:00 PM (Central Time)

The need to transition from fossil fuels to renewable energy is becoming ever more obvious and urgent. Energy storage is a critical component of the energy transition. Advances in energy storage technology, policy, and applications are quickly increasing around the world, and keeping up with those changes is an ongoing challenge. This workshop series—targeting many issues specific to the Southeast—addresses those advances in energy storage to help stakeholders stay up to date on energy storage roles and capabilities.

### Agenda

#### Session 4: Energy Storage as Generation, Transmission and Distribution; Regulators

1:00 – 1:10	<b>Introductory Remarks</b> Dr. Imre Gyuk, Director, Energy Storage Program, U.S. DOE Office of Electricity
1:10 – 1:30	<b>Keynote</b> Eric Hsieh
1:30 – 1:50	<b>Transmission &amp; Distribution Deferral</b> Dr. Babu Chalamala, Manager, Energy Storage Technology and Systems, Sandia National Laboratories
1:50 – 2:10	<b>Policy Levers for Energy Storage Adoption in the Southeast</b> Will McNamara, Policy Analyst, Sandia National Laboratories
2:10 – 2:20	<b>Break</b>
2:20 – 3:20	<b>State Commission Panel</b> <i>Moderator:</i> Will McNamara, Policy Analyst, Sandia National Laboratories
3:20 – 3:30	Panel Q&A



## Speaker Biographies



Sandia National Laboratories is a multimission laboratory managed and operated by National Technology & Engineering Solutions of Sandia, LLC, a wholly owned subsidiary of Honeywell International Inc., for the U.S. Department of Energy's National Nuclear Security Administration under contract DE-NA0003525. SAND



After taking a B.S. from Fordham University, **Dr. Imre Gyuk** did graduate work at Brown University on Superconductivity. Having received a Ph.D. in Theoretical Particle Physics from Purdue University he became a Research Associate at Syracuse. As an Assistant Professor he taught Physics, Civil Engineering, and Environmental Architecture at the University of Wisconsin. Dr. Gyuk became an Associate Professor in the Department of Physics at Kuwait University where he became interested in issues of sustainability. Dr. Gyuk joined the Department of Energy to manage the Thermal and Physical Storage program. For the past two decades he has directed the Electrical Energy Storage research program in the Office of Electricity, developing a wide portfolio of storage technologies for a broad spectrum of applications. He supervised the \$185M ARRA stimulus funding for Grid Scale Energy Storage Demonstrations and is now partnering with the States on numerous storage projects for grid resilience. His work has led to 12 R&D 100 awards, two EPA Green Chemistry Challenge Awards, and Lifetime Achievement Awards from ESA and NAATBatt. He is internationally recognized as a leader in the energy storage field.



**Dr. Babu Chalamala** is Manager of the Energy Storage Technology and Systems Department and Program Manager for Grid Energy Storage at Sandia National Laboratories. Prior to joining Sandia in 2015, he spent twenty years in industry R&D, most recently as a Corporate Fellow at MEMC Electronic Materials where he led R&D and product development in grid scale energy storage. Before that, he was involved in two startup companies for eight years. He spent the early part of his research career at Motorola and Texas

Instruments where he made contributions to electronic materials and display technologies. An electrical engineer by training, Dr. Chalamala has a B.Tech. in Electronics and Communications Engineering from Sri Venkateswara University and a Ph.D. in Physics from the University of North Texas. He is a Fellow of the IEEE, Academy of Sciences – St. Louis, a member of the Materials Research Society, and a life member of the Electrochemical Society. He served on the editorial boards of Proceedings of the IEEE, IEEE Access, IEEE Journal of Display Technology, and Energy Storage journal. Babu currently serves on the as Chair of IEEE PES Energy Storage and Stationary Battery Committee and as a member of the PES Industry Technical Leadership Committee. Babu served as a General Chair of the 2006 MRS Fall meeting and continues play an active leadership role in the Materials Research Society, where he serves on several society operating committees. Dr. Chalamala has authored 120 papers, edited journal special issues, and was awarded 10 US patents.



**Will McNamara** serves as Grid Energy Storage Policy Analyst for Sandia National Laboratories with a focus on energy storage policy development at the federal and state levels. Will has spent his entire 23-year career in the energy and utilities industry with a concentration on regulatory and legislative policy. He has served as a lobbyist in California and has represented major utilities across the U.S. in numerous jurisdictions in proceedings pertaining to integrated resource planning, procurement, cost recovery, rate design, and the development of policymaking best practices. Will's areas of subject matter expertise, in addition to energy storage policy, include distributed energy resources, AMI/smart grid, renewables, and competitive retail markets.

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