



POWER TALKS

ENERGY EDUCATION SERIES

EXPLORING MICROGRIDS: THE SASKATCHEWAN CONTEXT

WEDNESDAY, JUNE 5, 2024 | 12 – 1 PM

Microgrids are local power grids that operate independent of SaskPower's main power system. They're useful in many cases, but not in every situation. So, when and where do microgrids make sense in Saskatchewan? At this session, we'll answer that question, explore decentralized power, how microgrids operate and what they could look like in the future.

saskpower.com/power talks

PANELISTS

MODERATOR



Arsalan
Asif



Ryan
Jansen



Doug
Wagner



Derek
Leverington



PANELIST:

ARSALAN ASIF

Arsalan is a professional engineer (P.Eng.) with 14 years of experience in industrial, commercial, and residential energy management. He holds a bachelor's degree in electrical engineering from Toronto Metropolitan University and is registered with the Association of Professional Engineers and Geoscientists of Saskatchewan (APEGS). Additionally, he is a Certified Energy Manager (CEM) and Certified Energy Auditor (CEA) with the Association of Energy Engineers (AEE). Arsalan is skilled in implementation of energy efficiency, renewable energy, and building retrofit projects. He is also adept at facilitating the development of power generation projects such as Net Metering and Microgrids. Arsalan was honored with the 2017 APEGS Environmental Excellence Award as lead engineer on SaskPower's Industrial Energy Optimization Program.



PANELIST:

RYAN JANSEN

Ryan Jansen received a B.Sc. in Engineering Physics and a M.Sc. from the University of Saskatchewan in Electrical Engineering, with a focus on microgrid reliability. He is a Professional Engineer and the Team Lead of Integrated Energy Systems at the SRC with Permission to Consult in the areas of Energy Systems and Environmental Monitoring. Ryan has experience in project management, as well as technical expertise in small modular nuclear reactors, microgrids, renewable energy systems, energy storage, remote monitoring systems and district heating systems. Most recently, he has been working on hybrid energy system product development with a focus on deep decarbonization.



PANELIST:

DOUG WAGNER

Doug Wagner is an engineer registered with APEGS currently working as an Electrical Power Systems Engineer with Shermco Industries Canada. Prior to working with Shermco Doug was an Instructor with the University of Regina's Faculty of Engineering & Applied Science, where he was a technical resource for the recently completed U of R Micro Grid System, commissioned in December 2023. Doug's career also saw him operate the family organic grain farm south of Moose Jaw, and he also managed and worked with the over the air broadcast facilities of the Canadian Broadcasting Corporation in Saskatchewan.

In 2017 Doug and his wife Suzanne began their journey into residential renewable generation with the installation of grid tied solar on their Regina home. Through three additional iterations they have expanded this system into a full residential micro grid system, with storage and islanding capabilities. They recently applied this system to reducing their heating and transportation carbon footprint through the installation of a heat pump, and a PHEV.



MODERATOR:

DEREK LEVERINGTON

Derek is a trained facilitator and partner at MPATH Engagement, with a personal interest in helping participants collaborate and discover creative solutions to complex challenges. Derek has over twenty years of experience working with public sector clients on public policy consultations, digital engagement initiatives and web technology projects.

ABOUT SASKPOWER

Established in 1929, SaskPower is Saskatchewan's leading energy supplier. Our corporate mission is to ensure reliable, sustainable and cost-effective power for our customers and the communities we serve.

SaskPower's team is made up of nearly 3,100 permanent full-time employees. We manage almost \$13 billion in generation, transmission, distribution and other assets. Our company operates seven natural gas power stations, three coal-fired power stations, seven hydroelectric stations, and two wind facilities. Combined, they generate 3,968 megawatts (MW) of power. SaskPower also buys power from various independent power producers. Our company's total available generating capacity is 5,437 MW.

We're responsible for serving over 550,000 customer accounts within Saskatchewan's geographic area of approximately 652,000 square km. We maintain over 160,000 circuit km of power lines, 59 high voltage switching stations and 200 distribution substations.

ABOUT SASKATCHEWAN RESEARCH COUNCIL (SRC)

The Saskatchewan Research Council (SRC) is Canada's second largest research and technology organization. SRC offers a wide range of services to help broaden clients' energy mix, improve their existing operations and chart their path toward net zero. We work with clients to identify ways to leverage renewable options through integrated energy systems, storage and optimization to improve their operation's energy efficiency and productivity.

ABOUT SHERMCO INDUSTRIES CANADA

Shermco is North America's largest and fastest-growing electrical testing organization accredited by the InterNational Electrical Testing Association. Trusted since 1974, Shermco has you covered when it comes to electrical testing, maintenance and industry requirements. Shermco brings a comprehensive understanding of international electrical power standards and industry requirements combined with decades of customer experience. With more than 700 skilled engineers and technicians, Shermco meets every need for reliable electrical power solutions. From engineering solutions to in-shop motor repair, your trusted partner for electrical testing services is a resource for anything you need in the electrical power system.