



Introduction to Data Center Infrastructures – Power, Cooling, and DCIM

Presented by Mietek Glinkowski of ABB and Dave Sterlace of Thomas & Betts

Abstract

Data Centers is a rapidly growing industry experiencing unprecedented merger of many different technologies from hardware to software, from IT to electric power to cooling. Most engineers are familiar only with some aspects of the data center technologies but do not grasp the “big picture” of the industry.

As data centers grow in size and numbers the demand for power and cooling grows to the point where they consume an estimated 1.5-2% of the global electrical energy.

This webinar will address technology fundamentals of data center infrastructures, particularly power and cooling and how these infrastructures are managed by specialized DCIM (Data Center Infrastructure Management) tools.

We will also discuss the type of power distribution architectures involved in designing reliable data centers and the basics of data center operations from the power point of view. Tier diagrams, supply redundancy, emergency power, and PUE (Power Usage Effectiveness) will be presented.

Finally emerging technology trends will be addressed.

Who Should Attend

Electrical, computer, power, software and electronics engineers involved in IT, server, and power for data centers. Students in the respective fields can also benefit.



Presenters



Dr. Mietek Glinkowski holds advanced degrees from Poznan Polytechnic, Poland (cum laude) and Rensselaer Polytechnic Institute, Troy, NY. Dr. Glinkowski was a Fulbright Scholar and a professor of Electric Power Engineering at RPI. After joining ABB in 1997 he has held a variety of positions most recently as a Director of Technology for Power Products and Global Head of Technology for ABB Data Centers. He is a Member of IEEE, Switchgear Committee, NY Academy of Sciences, Sigma Xi Research Society, SEP (**S**ociety of **E**ngineers in **P**oland), CIGRE, the Current Zero Club, and E-merge alliance. He is a registered Professional Engineer in the state of New York and US National Representative to CIGRE A3- High Voltage Equipment. He holds 7 US Patents and authored over 50 technical papers. He often speaks on subjects of power systems, renewable energy integration, distribution automation, power infrastructure, data centers, and industry standards. He received an IEEE Outstanding Engineer of the Year Award of the North Carolina Chapter in 2002 and the Attwood Associate award from CIGRE National Committee in 2012.



Dave Sterlace is the Market Development Manager for Data Centers and Critical Power for ABB Thomas and Betts Low Voltage Products for the US and Latin America.

Dave has over 20 years of industry experience in the critical power industry. Dave is the Critical Power Segment manager for ABB Low Voltage Breakers & Switches globally.

Dave has been with ABB since 2000, and his experience includes Sales, Marketing, Business Development and Account Management in regional, national and global roles.

Dave received a Bachelor of Science in Industrial Distribution from Clarkson University. Dave and his family live in the Philadelphia area.