Lukas Graber



Lukas Graber received his M.S. and Ph.D. degrees in electrical engineering from ETH Zurich in 2002 and 2009 respectively. His Ph.D. research focused on SF₆ leakage detection in gas insulated switchgear and was awarded with the ETG Innovation Prize. Before he joined Georgia Tech as an assistant professor in 2015, he worked several years at the Center for Advanced Power Systems, Florida State University initially as a post-doctoral research associate and later as a research faculty member. This is also where he started his research on cryogenic topics. His focus was on superconducting power cables and fault current limiters, but also ultra-fast mechanical switchgear, short circuit forces in substations, and grounding aspects of power distribution systems on future all-electric Navy ships. In his lab at Georgia Tech, he started new research initiatives in cryogenic power electronics and cryogenic switchgear. Besides fundamental and applied research projects, he is also interested in commercialization aspects of new technologies. He teaches various courses in power systems and high voltage engineering, in which he integrated new topics including superconducting power devices and cryogenic dielectric materials. He is a guest technical editor for special issues of the IEEE Transactions on Applied Superconductivity and contributes to the CIGRE working group D1.64 in cryogenic dielectrics. Together with his graduate students and his postdoc, he has built the Plasma and Dielectrics Laboratory, published over 80 articles in scientific journals and conference proceedings, and filed several patent applications. In his free time, he likes to tinker with audio electronics, play the trumpet, scuba dive in Floridian waters, and paraglide in mountain ranges around the world.