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Education and Research in Energy Systems at CMU

Carnegie Mellon University
College of Engineering

CMU College of Engineering Locations/Departments

Locations



Departments

- Biomedical Engineering
- Chemical Engineering
- Civil & Environmental Engineering
- Electrical & Computer Engineering
- Engineering & Public Policy
- Materials & Science Engineering
- Mechanical Engineering
- CyLab
- Information Networking Institute
- Institute for Complex Engineered Systems

Key Statistics for CMU College of Engineering

- Faculty:
 - 144.5 FTE Tenure Track Faculty
 - 30 Research Faculty and 11.5 Teaching Faculty
 - 40 Special Faculty and 488 staff members
- Students:
 - 1,781 undergraduate FTE (28.6% of CMU)
 - 2,093 graduate FTE (31.3% of CMU)
 - 826 PhD; 1,267 MS

CMU Electricity Conferences

- Forum for inter-disciplinary thinking about current and future challenges and opportunities in the changing electric energy industry
- Co-founders late Lester Lave and Marija Ilic in 2004



CMU Electricity Conferences (con't.)

- An outreach activity from the NSF ITR project (2004-2010) entitled Toward a Multi-Layered Architecture for Reliable and Secure Large-Scale Networks
<http://www.ece.cmu.edu/~nsf-itr/>
- Each year different major topic; all available and archived on <http://www.eesg.ece.cmu.edu/>
- This year's topic: Role of Distributed Coordination in Resilient & Fine-Grain Control of Power Grid

CMU Commitment to Energy Systems

- Distributed research efforts across most of CMU's College of Engineering departments, the School of Computer Science, Tepper and SEI
- Wilton E. Scott Institute for Energy Innovation
- MS Program: Energy Science, Technology and Policy



CMU Commitment to Energy Systems (Global)



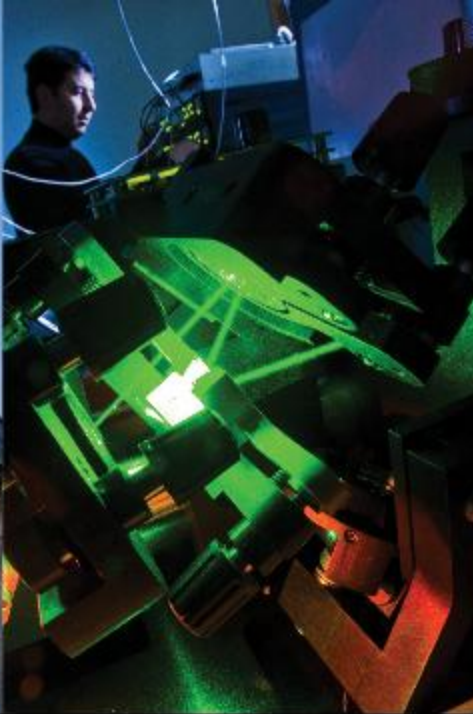
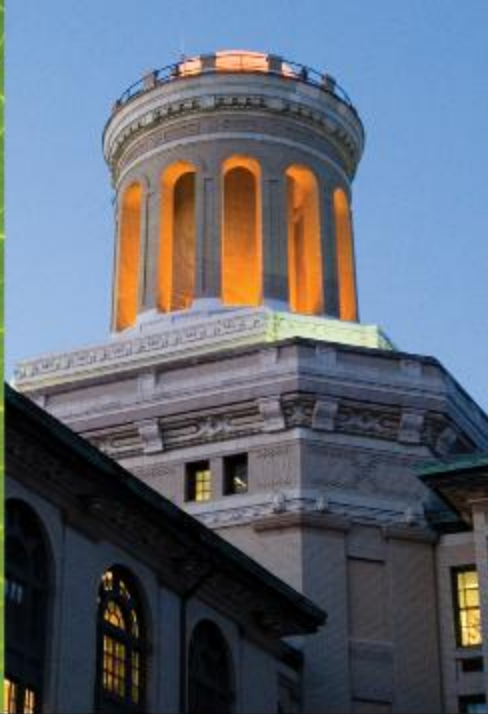
- Information and Communications Technology Institute (ICTI) through our CMU Portugal program – dual PhD program and joint research projects.
- CMU Silicon Valley – visualization, solar power and security/privacy major efforts in the area of smart power grids



CMU Commitment to Energy Systems (Global)

- CMU-Rwanda – main emphasis on micro-grids for developing countries and use of telecom for enabling these micro-grids.
- Sun Yat-sen and CMU Joint Institute of Engineering (JIE) – one of the main areas for both education and research are Smart Grids.





Welcome to CMU! Enjoy the Conference!

Carnegie Mellon University
College of Engineering