

Model Predictive Control in Buildings Workshop

MONTREAL, JUNE 24-25, 2011

CALL FOR PRESENTATION PROPOSALS

The promise of harnessing the predictive and diagnostic powers of a well-calibrated building energy model for improved building operations is attracting a growing number of researchers around the globe. IBPSA-USA and IBPSA-Canada invite you to join a two-day workshop on model predictive control (MPC) in buildings that will serve as a forum for lively dialogue on different approaches, applications, and field experiences. The event will feature a series of technical presentations, selected by a Scientific Committee of internationally recognized domain experts, as well as time for networking and exchange. It will close with a roundtable discussion to define future research needs and highlight opportunities for collaboration and business applications. The Scientific Committee will then invite 5 to 7 presenters to submit manuscripts to be published in a 2012 Special Issue of the Journal of Building Performance Simulation (JBPS) on "MPC in Buildings."

Timeline

March 15 Proposals (title, abstract,

author, affiliation) due

April 15 Proposal acceptances

Workshop schedule

Friday June 24 3pm - 6pm Presentations

6pm - 9pm Group dinner (self-pay)

Saturday June 25 9am - 12pm Presentations

12pm - 1pm Lunch (provided)

1pm - 3pm Roundtable discussion

Possible areas of interest include

- Model calibration, mismatch management
- Simulation speed for real-time implementation
- Model complexity
- Field implementations
- Computing platform issues
- Optimization techniques

Scientific Committee

Johan Åkesson Lund University, Sweden
Andreas Athienitis Concordia University, Canada
Ian Beausoleil-Morrison Carleton University, Canada

Francesco Borrelli UC Berkeley, USA
Clemens Felsmann TU Dresden, Germany
Jan Hensen TU Eindhoven, Netherlands

Colin Jones EPFL, Switzerland

Michael Kummert Ecole Polytech., U Montreal, Canada

Ardeshir Mahdavi TU Vienna, Austria

Yasuo Utsumi Sendai National College of Tech., Japan

Shengwei Wang Hong Kong University

Workshop Location Room EV2.184

Engineering, Computer Science and Visual Arts Integrated Complex Concordia University, 1515 Saint Catherine W., Montreal, Quebec

Workshop Chair

Gregor Henze U Colorado, USA

Organizing Committee

Brian Coffey UC Berkeley, USA Peter May-Ostendorp U Colorado, USA

Meli Stylianou Natural Resources Canada

Registration Fee

\$25, collected at the door

Presentation Proposals and General Inquiries

MPCworkshop@gmail.com

This event is endorsed by IBPSA-USA and IBPSA-Canada. It is scheduled to occur directly before the IBPSA-USA biannual meeting.

