

5th GridOPTICS Workshop on Next-Generation Analytics for the Future Power Grid

(Sponsored by DOE GMLC Project 1.4.18 “Computational Science for Grid Management”)

Wednesday, November 9, 2016 and Thursday, November 10, 2016

Location: 3820 Systems Engineering Building (SEB) building (EIOC East, Current Room and Voltage Room)

Agenda

Wednesday, November 9, 2016		
TIME	TOPIC	SPEAKER
8:00-8:30am	Badging	
8:30-8:45am	Opening remarks and Introduction	Jud Virden, Henry Huang
8:45-9:15am	GMLC Computational Science Vision	Gil Bindewald, Ali Ghassemian, Mihai Anitescu
9:15-9:35am	Computational Framework	Henry Huang
9:35-9:45am	Overview of Use Cases	Mihai Anitescu
9:45-9:55am	Question and Answer for Use Cases	All
9:55-10:10am	Break	
10:10-11:30am	Three Parallel Breakout Sessions <ul style="list-style-type: none"> - Use case 1 – Security-Constrained AC OPF under Uncertainty - Use case 2 – Dynamic Security Assessment with Uncertainties - Use case 3 – Optimization under Uncertainty with Transient Security Constraints 	Moderator/Notetaker - Mihai Anitescu/Wes Jones - Henry Huang/Russell Bent - Slaven Peles/Jean-Paul Watson
11:30-1:00pm	Lunch	
1:00-1:30pm	Preliminary Reports of Use Case Breakout Sessions (quad charts)	Breakout Moderators
1:30-2:30pm	Stakeholder Panel on Computational Needs and Barriers Panelists: Kwok Cheung (GE), Eugene Litvinov (ISO-NE), Guangyi Liu (SGCC), Teems Lovett (UTRC), and David Sun (Glarus) - Initial observation from the use cases	Moderator: Henry Huang

	- Stakeholders' own experiences - Suggest new use cases if any	
2:30-3:00pm	Solver Themes from the Use Cases	Mihai Anitescu
3:00-3:15pm	Break	
3:15-3:45pm	EIOC tour	Henry Huang
3:45-4:00pm	Drive to CSF	
4:00-4:30pm	CSF Visualization Center tour	George Chin
4:30-5:00pm	PIC tour	Michael Peterson

Thursday, November 10, 2016		
TIME	TOPIC	SPEAKER
8:30-9:30am	Three Parallel Breakout Sessions – continued - Use case 1 - Use case 2 - Use case 3	Moderators/ Notetakers
9:30-10:00am	Reports of Use Case Breakout Sessions (quad charts)	Breakout Moderators
10:00-10:15am	Closing Remarks	Henry Huang
10:15-10:30am	Break	
10:30-12:30pm	GridPACK Tutorial	Bruce Palmer

Workshop Organizing Committee:

- Mihai Anitescu, GMLC Project 1.4.18 Project Manager, Argonne National Laboratory (ANL)
- Henry Huang, Workshop Chair, Pacific Northwest National Laboratory (PNNL)
- Slaven Peles, Lawrence Livermore National Laboratory (LLNL)
- Wesley Jones, National Renewable Energy Laboratory (NREL)
- Jean-Paul Watson, Sandia National Laboratory (SNL)
- Russell Bent, Los Alamos National Laboratory (LANL)

Contact

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Attendee list

<u>NAME</u>	<u>ORGANIZATION</u>
Mihai Anitescu	Argonne National Laboratory
Russell Bent	Los Alamos National Laboratory
Ting Chan	Global Energy Interconnection Research Institute North America
Yousu Chen	Pacific Northwest National Laboratory
Kwok Cheung	General Electric
Ruisheng Diao	Pacific Northwest National Laboratory
Zhenyu (Henry) Huang	Pacific Northwest National Laboratory
Wesley Jones	National Renewable Energy Laboratory
Ryan King	National Renewable Energy Laboratory
Kibaek Kim	Argonne National Laboratory
Eugene Litvinov	ISO New England
Guangyi Liu	Global Energy Interconnection Research Institute North America
Teems Lovett	United Technologies Research Center
Bruce Palmer	Pacific Northwest National Laboratory
Slaven Peles	Lawrence Livermore National Laboratory
Poorva Sharma	Pacific Northwest National Laboratory
David Sun	Glarus Group
Fengyu Wang	Midcontinent Independent System Operator
Lei Wang	PowerTech Labs
Zhiwei Wang	Global Energy Interconnection Research Institute North America
Jean-Paul Watson	Sandia National Laboratories
Jun Wen	Southern California Edison

REMOTE ATTENDEES

Gilbert Bindewald	DOE Office of Electricity
Ali Ghassemian	DOE Office of Electricity