

## **NASPI Work Group Virtual Meeting and Vendor Show**

**October 5-7, 2021**

### **Agenda**

**8:00am PT / 11:00am ET**

The North American Synchrophasor Initiative (NASPI) Work Group Virtual Meeting will be October 5-7, 2021. These three days will feature presentations from invited speakers and NASPI Partners who will share various aspects of synchrophasor systems, technology updates, data sharing challenges, real time simulation, data analysis, and exploration of high-speed measurements associated with inverter-based resources.

Our distinguished keynote speaker will be Dr. Renata Rubeša, Head of Support to the Power System Control at the Croatian Transmission System Operator Ltd. or HOPS. HOPS has almost 15 years of experience in synchrophasors, from PMU technology to WAMS applications and its use in the control room and they have used synchrophasor technology in major disturbances in the European interconnected system. HOPS is an essential service provider and obliged to follow the European Union Directive on security of network and information systems giving them experience in cyber security issues, application of measures and incident reporting methods.



Other meeting highlights consists of updates from the NASPI task team, NERC SMWG, WECC JSIS, IEEE, and the EIDSN.


**Registration is open!** To receive the *early bird* registration fee of \$100 for standard attendees and \$50 for students register **on or before September 24**. On September 25 regular registration rate will be \$150 and \$75 respectively.


**Partnership opportunities:** We are encouraging the partners to participate in the virtual NASPI Technology Partner Presentations. Each partner will have an opportunity to address the work group audience throughout the meeting based on the level of partnership procured. Partners, this is your opportunity to share your work, technological advancements, innovative ideas, and updates with the larger group which we hope will foster further networking and collaboration. Learn more [here](#).

Draft Agenda 9/22/21

Eastern Time	Tuesday, October 5, 2021
11:00 – 11:05 am	Welcome & Introductions: Jeff Dagle (PNNL)
11:05 – 11:45 am	Keynote: Croatian Transmission System Operator Ltd. or HOPS - Renata Rubeša.
11:45 – 11:55 am	NASPI Update – Jeff Dagle
	<b>Session # 1 – Big Data</b>
11:55 – 1:15 pm	Panel moderator: Sandra Jenkins (U.S. DOE) Big Data Analytics and Machine Learning <ul style="list-style-type: none"> <li>• Machine Learning Guided Operational Intelligence from Synchrophasors - David Daigle (SEL)</li> <li>• Big Data Synchrophasor Monitoring and Analytics for Resiliency Tracking (BDSMART) - Mladen Kezunov (Texas A&amp;M)</li> <li>• Combinatorial Evaluation of Physical Feature Engineering &amp; Deep Temporal Modeling for Synchrophasor Data at Scale - Sean Murphy (PingThings)</li> <li>• Discovery of Signatures, Anomalies, and Precursors in Synchrophasor Data with Matrix - Profile and Deep Recurrent Neural Networks - Nanpeng Yu (University of California, Riverside)</li> <li>• MindSynchro: innovation and challenges in application of ML to PMU Big Data - Bruno P. Leao (Siemens)</li> </ul>
1:15 – 2:00 pm	<b>Break</b>

2:00 – 2:20 pm	 SCHWEITZER ENGINEERING LABORATORIES Partner presentation from SEL – Jared Bestebreur
<b>Session # 2 – Synchrophasor Projects and Edge Computing Solutions</b>	
2:20 – 2:40 pm	Status of ESAMS - Joe Eto
2:40 – 3:00 pm	ComEd’s Synchrophasor Project - David Schooley
3:00 – 3:05 pm	<b>Break</b>
3:05 – 4:35 pm	Panel moderator: Matthew Rhodes (SRP) Synchrophasors on the Edge: Edge Computing Solutions using Synchrophasors <ul style="list-style-type: none"> <li>• Neeraj Nayak (EPG)</li> <li>• Mladen Kezunovic (Texas A&amp;M)</li> <li>• Mark Konya (SAS)</li> <li>• Dr. Anamitra Pal (ASU)</li> </ul>
4:35-4:55pm	 Partner presentation from STER - Dalibor Brnobić

<b>Eastern Time</b>	<b>Wednesday, October 6, 2021</b>
11:00 – 11:05 am	Welcome & Agenda Review: Jeff Dagle (PNNL)
<b>Session # 3 - Inverter-based Resources</b>	
11:05 – 12:35 pm	Panel moderator: Sascha von Meier, UC Berkeley Synchronized Measurements for Modeling and Control of Inverter-Based Resources <ul style="list-style-type: none"> <li>• Ryan Quint, NERC</li> <li>• Yasutoshi Yoshioka, Fuji</li> <li>• Gunnar Kästle, Technische Universität Clausthal</li> <li>• Ben Kroposki, NREL</li> </ul>
12:35 – 1:30 pm	<b>Break</b>
<b>Session # 4 - Real Time Simulators</b>	
1:30 – 2:30 pm	Panel moderator: Evangelos Farantatos (EPRI) Role and Use Cases of Real Time Simulators (RTS) Towards Advancing and Deploying Synchrophasor Based Wide Area Monitoring Protection and Control (WAMPAC) Systems <ul style="list-style-type: none"> <li>• RTDS</li> <li>• OPAL-RT</li> <li>• NYPA</li> </ul>
2:30 – 2:50 pm	 Partner presentation from Adva – Nino De Falcis
<b>Session # 5- Task Team Updates</b>	
2:50 – 3:00 pm	CRSTT Update
3:00 – 3:10 pm	DisTT Update
3:10 – 3:20 pm	EATT Update
3:20 – 3:30 pm	PRSVTT Update
3:30 – 3:40 pm	DNMTT Update
3:40 – 3:45 pm	<b>Break</b>
3:45 – 4:05 pm	 Partner presentation from PingThings – Sean Murphy
<b>Session # 6 – Data Sharing</b>	
4:05 – 5:05 pm	Data Sharing - Eric Andersen and Dan Brancaccio <ul style="list-style-type: none"> <li>• Jim Ball (WAPA)</li> </ul>
<b>NASPI Work Group Reception</b>	
5:05 – 6:00 pm	<b>Please join us in the NASPI Reception in the main meeting room.</b>

Eastern Time	Thursday, October 7, 2021
11:00 – 11:05 am	Welcome & Agenda Review: Jeff Dagle (PNNL)
	<b>Session # 7 – Using Synchrophasor Data in the Control Room</b>
11:05 – 11:25 am	Landsnet use of synchrophasor data for monitoring and control of your system - Birkir Heimisson (Landsnet)
	<b>Session # 8 – IEEE/NASPI Oscillation Source Contest</b>
11:25 – 12:55 pm	Panel moderator: Jim Follum (PNNL) Top Performers of the IEEE-NASPI Oscillation Source Localization Contest <ul style="list-style-type: none"> <li>• Team RPI – from Rensselaer Polytechnic Institute</li> <li>• Team Woodpecker – from General Electric</li> <li>• Team FIUBA – from University of Buenos Aires</li> </ul>
12:55 – 2:00 pm	<b>Break</b>
	<b>Session # 9 – Other Synchronized Measurements Update</b>
2:00 – 2:10 pm	NERC Synchronized Measurement Working Group (SMWG) update: Tim Fritch (TVA)
2:10 – 2:20 pm	WECC JSIS update: Gage Marek (BPA)
2:20 – 2:30 pm	EIDSN update – Kent Simendinger
2:30 – 2:40 pm	IEEE update: Allen Goldstein
2:40 – 3:00 pm	 <b>MathWorks</b> Partner presentation from MathWorks - MathWorks Update on Capabilities for System Simulation and Data Analytics - Jonathan LeSage and Graham Dudgeon
3:00 – 3:05 pm	<b>Break</b>
	<b>Session # 10 – Inertia Monitoring</b>
3:05 – 4:35 pm	Panel moderator: Aftab Alam (CAISO) Recent trends in Inertia Monitoring, Estimation, Forecasting and Impacts on the Grid <ul style="list-style-type: none"> <li>• Yilu Liu (UTK)</li> <li>• Gang Zhang (GE)</li> <li>• Stuart Clark (GE)</li> <li>• Krish Narendra (EPG)</li> <li>• Urmila Agarwa (PNNL)</li> </ul>
4:35 – 4:55 pm	<b>NASPI Partner #6</b>
4:55-5:00 pm	Open Discussion and Questions, moderated by Jeff Dagle

NASPI would like to say “**THANK YOU**” to the following partners for their support

