

**Webinar Agenda**  
**Advanced Sensors and Instrumentation (ASI)**  
**2019 NE I&C Review**  
**(All Times are Eastern Daylight Time)**

**Wednesday, November 6, 2019**

---

10:00 am Welcome and Overview of Webinar Protocol (Craig Primer, INL)

**Big Data and Machine Learning:**

10:15 am Analytics at scale of Sensor Data for Digital Monitoring in Nuclear Plants (Vivek Agarwal, INL)

10:45 am Deployable Risk-Informed Predictive Maintenance Strategy for Commercial Nuclear Power Plants (Vivek Agarwal, INL)

11:15 am Improving Nuclear Power Plant Efficiency through Data Analytics (Wes Hines, University of Tennessee)

11:45 am Process Constrained Data Analytics for Sensor Assignment and Calibration (Rick Vilim, ANL)

**12:15 pm Lunch Break**

12:45 pm Small Modular Reactors (NuScale) (Brian Arnholdt, NuScale)

1:15 pm Big data analytics solutions to improve nuclear power plant efficiency; Online monitoring, visualization, prognosis, and maintenance decision making (Kaibo Liu, University of Wisconsin-Madison)

1:45 pm Big Data For Operation and Maintenance Cost Reduction (Carol Smidts, Ohio State)

2:15 pm Development of optical fiber- based gamma thermometer (Thomas Blue, Ohio State)

**New Activities:**

2:45 pm Innovation Portal demo (Casey Kovesdi, INL)

3:15 pm GAIN Sensor Workshop Overview (Lori Braase, INL)

3:45 pm Sensor and Instrumentation Website Overview (Tim Downing, PNNL)

4:15 pm ASI Strategic Plan/Feedback/Discussion (Craig Primer, INL)

4:45 pm Concluding Remarks (Suibel Schuppner, DOE)

**5:15 pm Adjourn**