



# SMART CAMPUSES

LEADING THE CAMPUS OF THE NEXT CENTURY

2019 OAPPA Annual Conference – May 28 to May 31

## Unlock Building Data to Tackle Industry Challenges

### Presentation Theme

Our industry is moving rapidly towards a predictive maintenance model. Today's Fault Detection Diagnostics (FDD) technology generates real-time, accurate data showing HVAC priorities, root causes, trends, and corrective actions. It serves as an evidence-based work selection tool that integrates with existing BAS and CMMS technologies to:

- Drive down energy costs & reach sustainability goals
- Optimize HVAC operations
- Reduce occupant comfort complaints
- Enhance the commissioning process

### Learning Outcomes/Take Aways:

In today's environment of rapid and accelerating change, facility leaders can drive immediate results by leveraging today's Internet and cloud-based technologies. KGS will share real world case studies illustrating examples of best practices so participants will learn how FDD has evolved and is helping to:

- Stretch limited FM budgets as assets age and deferred maintenance grows (20% of maintenance and energy expense may be saved by predictive maintenance)
- Offset expanding workloads by keeping critical staff resources laser-focused on top priorities
- Effectively communicate priorities across the enterprise (measure and track through KPI's)
- Reduce risk and extend equipment life (80% of equipment failures occur for non-age related reasons)
- 

Participants will also learn of facility leaders who, through the successful use of FDD, are receiving industry recognition!

- **University of Iowa**
  - "Best Practices" award for HVAC Fault Detection & Diagnostics from the U.S. Department of Energy
  - APPA Effective and Innovative Practices Award / FDD
- ASHE "Energy Champion" award for **Kaiser Permanente Zion Medical Center** (San Diego)
- "Energy Savings Project of the Year" award from the Assoc. of Energy Engineers for **Amgen**, one of the world's leading biotechnology companies, who saved \$1.4M in their first year across 3 sites.

## Presenter:

Alex Grace

Alex Grace has over 10 years experience in Energy Efficiency, Big Data Analytics and Facilities Management. He is an accomplished speaker at both a national and international level. In 2017 he co-presented with Don Guckert, APPA president, at APPA's national conference, San Francisco, and again at the APPA Institute, Providence, RI. Alex has shared his experiences speaking at U.S. Green Building Council events, Realcomm / Intelligent Buildings Conferences and at workshops at select universities such as Stanford University. Alex is published in the book, *Automated Diagnostics and Analytics for Buildings*, Capehart and Bromley, 2015.