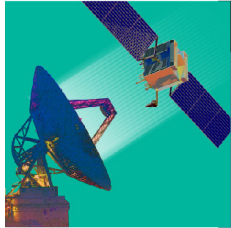


# Working Group Preview



## Ground System Architectures Workshop



Session 11B

### *Intelligent Systems / Machine Learning for Space Ground Systems*

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# ***Intelligent Systems / Machine Learning for Space Ground Systems***

## *GSAW 2019 – WG11B Poster*

Adaptive, reliable automation and intelligent decision making are essential for the success of our space ground systems. The challenge is finding the proper balance between human control and autonomy. Applied intelligent systems and machine learning solutions are emerging, but are often misunderstood, misapplied, too complex or costly to sustain, or insufficient for mission needs. Also, opportunities are missed to bring established or emerging technologies, solutions and architectures to the area of ground system space control and mission processing.

The “Intelligent Systems / Machine Learning for Space Ground Systems” working group seeks to identify and demystify where intelligent systems and machine learning currently exist in space ground systems, discover what emerging capabilities are being developed in the community, and to capture real-world impediments for adoption, and how intelligent systems/machine learning has advanced space systems resilience. It will explore deeper the questions of:

Where do intelligent systems and machine learning currently exist in space ground systems?

- What elements of space ground systems are suited to intelligent systems and machine learning
- What emerging capabilities and technologies are being developed in the community
- What are real-world impediments for adoption
- What capability and technology gaps exist and might seed further research and investment

The Working Group will break into 4 sub-topic areas to explore:

1. Space Operations
2. Mission Tasking and Resource Management
3. Mission Data Processing
4. Space Enterprise Management

# Intelligent Systems / Machine Learning for Space Ground Systems

GSAW 2019 – WG11B Poster

