



IEEE Topical Workshop on The Internet of Space (TwIoS)

20-23 January 2019, Orlando, FL, USA



IEEE



Paper Deadline
24 July 2018

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Call For Papers

The 2019 IEEE Topical Workshop on the Internet of Space (TwIoS2019) will be a part of IEEE Radio and Wireless Week (RWW), which will be held the week of 20 January 2019 in Orlando, FL, USA.

RWW2019 will also feature:

- IEEE Radio and Wireless Symposium (RWS)
- IEEE Topical Meeting on Silicon Monolithic Integrated Circuits in RF Systems (SiRF)
- IEEE Topical Conference on RF/Microwave Power Amplifiers for Radio and Wireless Applications (PAWR)
- IEEE Topical Conference on Wireless Sensors and Sensor Networks (WiSNet)
- Focus Sessions on 5G and mm-Wave to THz Technologies and Applications

Each of these events will be organized separately, with their own call for papers found at <http://www.radiowirelessweek.org/>

The Internet of Space (IoS) conference addresses the wild west of space applications, often called NewSpace, Entrepreneurial space, or Commercial Space. It is the emergent private spaceflight industry, with a special emphasis on microwave hardware. There has been a renaissance of interest and investment in space- and suborbital-based high-data-rate communication networks and other applications. Since the signal transit times are small enough, many more than classical applications are feasible: the creation of a worldwide car-to-car communication networks or global sensor & control systems for autonomous vehicles or Internet of Things (IoT) application. The Internet of Space (IoS) is ahead of the innovation curve; it is at a very early stage, so focused discussions can make great progress.

Papers featuring innovative work are solicited in (but not limited to) the following areas of the Internet of Space (IoS) hardware and systems:

- Manufacture and Deployment of Large LEO Satellite Constellations
- Lower-Cost Alternatives
- Lean manufacturing of space components
- Unmanned Air Systems
- Terrestrial Systems
- Cubesat Hardware and Systems
- Satellite and Balloon Concepts
- Small and Micro-Satellite Design
- Transition from old to new space
- Orbital Configurations & Operations
- Radiation Effects
- Phased Arrays
- High Data Rate Links
- Geolocation
- Earth Observation
- Frequency Spectrum Allocations
- International Regulations & Standards
- SIGHT Applications of the IoS
- Optical communication in space

TwIoS2019 Co-Chairs

Holger Maune, *Technische Universität Darmstadt*
Charlie Jackson, *Northrop Grumman*

Paper submission instructions can be found at <http://www.radiowirelessweek.org>. Submissions will be evaluated based on novelty, significance of the work, technical content, interest to the audience, and presentation.

All submissions must be received by 24 July 2018.

All accepted papers will be published in a digest and will be included in IEEE Digital Library Xplore.