

## PREFACE

The ISPRS Geospatial Week 2019 is a combination of 13 workshops organised by 30 ISPRS Working Groups active in areas of interest of ISPRS. The Geospatial Week 2019 is held from 10-14 June 2019, and is convened by the University of Twente acting as local organiser. The Geospatial Week 2019 is the fourth edition, after Antalya Turkey in 2013, La Grande Motte France in 2015 and Wuhan China in 2017.

The following 13 workshops provide excellent opportunities to discuss the latest developments in the fields of sensors, photogrammetry, remote sensing, and spatial information sciences:

- **C3M&GBD** – Collaborative Crowdsourced Cloud Mapping and Geospatial Big Data
- **CHGCS** – Cryosphere and Hydrosphere for Global Change Studies
- **EuroCow-M3DMaN** – Joint European Calibration and Orientation Workshop and Workshop on Multi-sensor systems for 3D Mapping and Navigation
- **HyperMLPA** – Hyperspectral Sensing meets Machine Learning and Pattern Analysis
- **Indoor3D**
- **ISSDQ** – International Symposium on Spatial Data Quality
- **IWIDF** – International Workshop on Image and Data Fusion
- **Laser Scanning**
- **PRSM** – Planetary Remote Sensing and Mapping
- **SarCon** – Advances in SAR: Constellations, Signal processing, and Applications
- **Semantics3D** – Semantic Scene Analysis and 3D Reconstruction from Images and Image Sequences
- **SmartGeoApps** – Advanced Geospatial Applications for Smart Cities and Regions
- **UAV-g** – Unmanned Aerial Vehicles in Geomatics

Many of the workshops are part of well-established series of workshops convened in the past. They cover topics like UAV photogrammetry, laser scanning, spatial data quality, scene understanding, hyperspectral imaging, and crowd sourcing and collaborative mapping with applications ranging from indoor mapping and smart cities to global cryosphere and hydrosphere studies and planetary mapping.

In total 143 full papers and 357 extended abstracts were submitted by authors from 63 countries. 1250 reviews have been delivered by 295 reviewers. A total of 81 full papers have been accepted for the volume IV-2/W5 of the International Annals of Photogrammetry, Remote Sensing and Spatial Information Sciences. Another 289 papers are published in volume XLII-2/W13 of the International Archives of Photogrammetry, Remote Sensing and Spatial Information Sciences.

The editors would like to thank all contributing authors, reviewers and all workshop organizers for their role in preparing and organizing the Geospatial Week 2019. Thanks to their contributions, we can offer an excessive and varying collection in the Annals and the Archives.

We hope you enjoy reading the proceedings.

George Vosselman, Geospatial Week Director 2019, General Chair  
Sander Oude Elberink, Programme Chair  
Michael Ying Yang, Programme Chair