



April 18, 2016

Professor Chen Jun, President  
International Society for Photogrammetry and Remote Sensing (ISPRS)  
Via email: [chenjun@nsdi.gov.cn](mailto:chenjun@nsdi.gov.cn), [chenjun\\_isprs@263.net](mailto:chenjun_isprs@263.net)  
and cc: [isprs-sg@ipi.uni-hannover.de](mailto:isprs-sg@ipi.uni-hannover.de) (ISPRS Secretary of General)

Dear Professor Chen:

The American Society for Photogrammetry and Remote Sensing (ASPRS) is honored to submit its bid for hosting Technical Commission II of ISPRS for the period 2016-2020. On behalf of the Board of Directors of ASPRS, I am pleased to nominate Dr. Jie Shan as Technical Commission President, in team with Dr. Sander Oude Elberink (ITC, University of Twente, The Netherlands) as Vice President.

We believe that ASPRS is uniquely positioned to host Commission II during the quadrennial period leading to the XXIV ISPRS Congress. ASPRS has played a leading and integral role in fostering photogrammetry and remote sensing technology in the United States since 1934, and has been a global leader in these technologies for most of that time. In the coming four years, the civilian government and private sectors in the United States will launch several satellites carrying new highly sophisticated sensors for acquiring superior spatial, spectral, and temporal data sets. Highly advanced airborne LiDAR mapping systems are becoming available and attractive to a full spectrum of civilian applications. In addition, ASPRS is at the leading frontiers of unmanned aerial systems (UAS) mapping. The images and data sets derived from these platforms and sensors will provide exciting new opportunities and challenges for Commission II and its various working groups.

As a Society, ASPRS has continued to strengthen its leading role in geospatial research, photogrammetry, remote sensing and imaging technologies by hosting a series of “specialty conferences” on these topics. We propose that the 2018 mid-Congress Symposium be held as another conference in this series, but one focused on Commission II topics and Working Group technical activities and interest. We also propose that this symposium be held at a place later determined in conjunction with the Fall ASPRS meeting. Besides, we will also be actively involved in the Geospatial Week activities in 2017 (Wuhan) and 2019 (TBD).

Dr. Shan has a stellar research record in the Commission II topical areas, as well as a lengthy and diverse experience in professional society affairs at all levels, as evidenced in the attached proposal statement as well as his CV (also attached). He has been extensively publishing with ISPRS since 1984, acting as a co-Chair of several Working Groups and member of the Scientific Advisory Committee since 2004. As an active scholar, he attended all ISPRS Congresses since 1996 (Vienna). His expertise and experiences speak favorably for an active and successful Commission II in 2016-2020.

ASPRS has a long history of significant contributions to the photogrammetric and remote sensing community, both in the US and internationally. We believe that Commission II, under the leadership of Dr. Shan, will thrive during the next four years. We are committed to support his efforts in this endeavor.

Sincerely,

*Michael Hauck*

Michael Hauck, Executive Director

Attachments:

- 1-page proposal sheet and CV of Dr. Shan
- Letter of endorsement for Dr. Sander Oude Elberink from the Dutch Society for Photogrammetry and Remote Sensing

cc (via email):

- ASPRS Board of Directors
- ISPRS Council
- Dr. Charles Toth

Date  
April 8th 2016  
Subject  
Application to host ISPRS Commission II  
Sent by  
Peter Hoogwerf  
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Dr. E. Lynn Usery  
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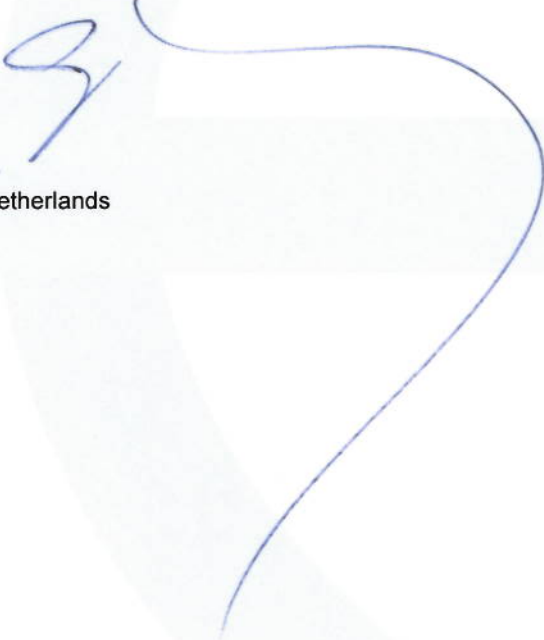
Our reference

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Dear Dr. Usery,

Geo-Information Netherlands, the Dutch ordinary member of the ISPRS, is pleased to support the nomination by the ASPRS of Dr. Jie Shan, Purdue University, as President of ISPRS Commission II (Photogrammetry) for the 2016-2020 term. Geo-Information Netherlands hereby nominates Dr. Sander Oude Elberink, University of Twente, as Vice-President for this commission.

Best regards,

  
Peter Hoogwerf MBA, LL.M  
President Geo-Information Netherlands

## **Proposal for Candidacy for the Presidency of Commission II of the International Society for Photogrammetry and Remote Sensing (ISPRS) for the Period of 2016-2020**

The American Society for Photogrammetry and Remote Sensing (ASPRS) is honored to submit its bid for hosting Technical Commission II of ISPRS for the period of 2016- 2020 by recommending Dr. Jie Shan as its President.



Dr. Jie Shan, Professor  
Lyles School of Civil  
Engineering  
Purdue University  
West Lafayette, Indiana  
USA

- 25+ years of research and teaching in photogrammetry and geospatial information science and technology
- 30+ years continuing involvement with ISPRS
- Subject matter expertise in image georeferencing, LiDAR mapping, pattern recognition, 3D reconstruction

### **Credentials:**

#### **Societies:**

- **ISPRS:** WG Co-Chairs on Image Fusion, Pattern Analysis in Remote Sensing (2004-2016); Scientific Advisory Committee (2012 – )
- **ASPRS:** Assistant Editor, Photogrammetric Engineering & Remote Sensing (2008 - )
- **IEEE:** Associate Editor, Transactions on Geoscience and Remote Sensing (2008 - )
- **IAPR:** Co-chair of Technical Commission 7 Remote Sensing and Mapping, International Association of Pattern Recognition, 2014-2016

#### **Publications:**

- Over 150 journal and proceeding papers; 5 book chapters
- Co-editor: 2 books (Topographic Lidar Ranging and Scanning; Geospatial Technology for Earth Observation); 4 journal special issues

#### **Memberships:**

- ASPRS member since 1999
- AAG member (non continuous)
- IEEE: member in 2008-2014, senior member since 2014

### **Vision:**

Imagery from diverse platforms is playing an increasingly more demanding and central role in geospatial science and technology. As the science, art and technology for acquiring information from images, photogrammetry is facing a number of challenges. Clearly, multi-platform and multi-modal sensors become ubiquitous and popular. There are diverse and tremendous needs on high quality image acquisition with accurate georeferencing. Image exploitation is shown merging with computer vision and computer graphics; and we learn from each other. Such connections need to retain and strengthen. LiDAR has been well adopted and yet many are emerging in terms of several recent exciting technological developments. Understanding various images is likely the most difficult task for photogrammetry. Achievements in machine learning and pattern recognition are of primary tools for this purpose. The Commission, together with its Working Groups and members, should be well prepared and structured in such a way that all aspects of photogrammetry are taken into account.

**Jie Shan**  
**Lyles School of Civil Engineering, Purdue University**  
**550 Stadium Mall Dr. West Lafayette, 47907 Indiana, USA**  
**Phone: +1-765-494-2168, Email: jshan@purdue.edu**

### **Education**

- Ph.D, Photogrammetry & Remote Sensing, Wuhan Technical University of Surveying and Mapping (now Wuhan Uni.), China, 1989. Advisors: Prof. Dr.-Ing. Zhizhuo Wang and Deren Li
- M.Sc. (with thesis) and B.Sc. (with thesis), Photogrammetry & Remote Sensing, Zhengzhou Institute of Surveying and Mapping, China, 1985, 1982

### **Employment**

- Professor, Geomatics Engineering, School of Civil Engineering, Purdue University, 2010-present
- Assoc. Prof., Geomatics Engineering, School of Civil Engineering, Purdue University, 2005-2010
- Assist. Prof , Geomatics Engineering, School of Civil Engineering, Purdue University, 1999-2005
- Senior Lecturer, Geoinformatics, Dep. of Technology, University of Gävle, Sweden, 1997 – 1998
- Assoc. Prof., Photogrammetry and Remote Sensing, Zhengzhou Institute of Surveying and Mapping, China, 1991 – 1994
- Lecturer (Assistant Professor), Photogrammetry and Remote Sensing, ibid, 1989-1990

### **Visiting Positions**

- Guest Professor and Head, School of Remote Sensing and Information Engineering, Wuhan University, China, 2010-2014 (on partial leave from Purdue)
- Research Fellow/Visiting Professor, Institute of Photogrammetry and GeoInformation, University of Hannover, Germany, 2005 (on partial leave from Purdue)
- Research Fellow of Alexander von Humboldt, Department of Geodetic Science, University of Stuttgart, Germany, 1995-1996

### **Editorial boards**

- Article Review Board, URISA Journal, Urban and Regional Information Systems Association, 200x-2010
- Assistant Editor, Photogrammetric Engineering and Remote Sensing, the American Society for Photogrammetry and Remote Sensing, 2008–present
- Associate Editor, IEEE Transactions on Geoscience and Remote Sensing, 2008-present
- Member of Editorial Board, International Journal of Data and Image Fusion, Taylor & Francis/CRC, 2008-present
- Member of Editorial Board, Journal of Geo-spatial Information Science, Taylor & Francis/CRC, 2012-present

### **Academic societies**

- Co-Chair, Working Group “Remote Sensing Data Fusion” of the International Society for Photogrammetry and Remote Sensing, 2004-2008
- Co-Chair, Working Group “Pattern Recognition for Remote Sensing” of the International Society for Photogrammetry and Remote Sensing, 2008-2012

- Co-Chair, Working Group “Pattern Analysis in Remote Sensing” of the International Society for Photogrammetry and Remote Sensing, 2012-2016
- Member, International Scientific Advisory Committee (ISAC), the International Society for Photogrammetry and Remote Sensing, 2012-present
- Co-Chair, Remote Sensing and Mapping, Technical Committee 7 (TC7) of the International Association for Pattern Recognition (IAPR), 2014-2016
- Member, Association of American Geographers, 2004, 2014- present
- Member, American Geophysical Union, 1997-Present, not consecutive
- Member, American Society for Photogrammetry and Remote Sensing – an Image and Geospatial Information Society, 1999-present
- Member, Institute of Electrical and Electronics Engineers (IEEE) Geoscience and Remote Sensing Society, 2008-2014
- Senior Member (<7% membership), Institute of Electrical and Electronics Engineers (IEEE) Geoscience and Remote Sensing Society, 2014-present

### **Honors and awards**

- Best Paper Prize, Chinese Society for Surveying and Mapping, China, 1990.
- Prize for Scientific and Technological Advancement, State Bureau of Surveying and Mapping, China, 1992.
- Prize for Outstanding Young Scholars in Science and Technology, Chinese Association of Science and Technology, China, 1992.
- Research Fellowship, Alexander von Humboldt Foundation, Germany, 1995-1996.
- Eduard Doležal Support for attending the 18th Congress of the International Society for Photogrammetry and Remote Sensing, the Federal Ministry of Science, Transport and the Arts, Austria, 1996.
- Research Fellowship, Alexander von Humboldt Foundation, Germany, Sept–Dec. 2005.
- Second Place (with Sharaf Alkheder), Poster Contest (College Category), Indiana GIS Conference, March 7-8, 2006.
- The Talbert Abrams Grand Award, 2007, issued by the American Society for Photogrammetry and Remote Sensing for the paper “Principles and Evaluation of Autostereoscopic Photogrammetric Measurement,” *Photogrammetric Engineering and Remote Sensing*, Vol. 72, No. 4, pp. 365-372, written by Jie Shan, Chiung Shiuan Fu, Bin Li, James Bethel, Jeffrey Kretsch, Edward Mikhail.
- The Acorn Award, Purdue University, 2007. It recognizes faculty members who attract large sponsored research grants; shared with James Bethel and Edward Mikhail.
- The MDA Award, 2007, presented by MacDonald Dettwiler's to stimulate authorship in Geomatics in the fields of Orthophotography, Photogrammetry, and Surveying. Papers were judged for originality, practical value, conciseness, clarity of expression and interest. The awarded paper is: Zhang, S., Shan, J., Peterson, J., Li, J., 2006. DEM Generation and Quality Assessment for Glacial Topography: A Case Study in Southern Range, Tasmania. *Geomatica, Canadian Institute of Geomatics*, Vol. 60, No. 1, pp. 35-45.
- The Excellence in GIS Award, 2009, issued by the Indiana Geographic Information Council for Dr. Shan’s work in flood mapping and its on-line service during the floods in June 2008. Dr. Shan was nominated by the USGS Indiana Office, which was supported by the Indiana Department of Homeland Security and by the U.S. Army Joint Forces Headquarters of Indiana.

- The ESRI Award for Best Scientific Paper in GIS, First Place, 2009, issued by the American Society for Photogrammetry and Remote Sensing for “an outstanding paper of scientific merit that advances the knowledge of GIS technology.” The award was given to the paper “J. Shan, S. Alkheder, J. Wang, 2008, Genetic Algorithms for the Calibration of Cellular Automata Urban Growth Modeling, Photogrammetric Engineering and Remote Sensing, Journal of the American Society for Photogrammetry and Remote Sensing, Vol. 74, No. 10, pp. 1267-1277.”
- Second place (with Ejaz Hussain, Serkan Ural), IndianaMap Poster Competition (Category of College and University Students), Building Extraction and Population Mapping Using High Resolution Images, Indiana GIS Conference, February 23-24, 2010.
- Listed in Who's Who Among Executives & Professionals, 2010 Edition and later Editions.

### **Full papers in refereed journals**

- [1] Shan, J., 1989. A Fast Recursive Method for Repeated Computation of Reliability Matrix Qvvp. Photogrammetry and Remote Sensing, Journal of the International Society for Photogrammetry and Remote Sensing, Vol.43, pp.337-346.
- [2] Li, D., Shan, J., 1989. Quality Analysis of Bundle Block Adjustment with Navigation Data. Photogrammetric Engineering and Remote Sensing, Journal of the American Society for Photogrammetry and Remote Sensing, Vol.55, No.12, pp.1743-1746.
- [3] Shan, J., 1994. Relative Orientation for Two-media Photogrammetry. The Photogrammetric Record, Journal of the British Remote Sensing and Photogrammetry Society, Vol.14, No.84, Oct., pp.993-999.
- [4] Grafarend, E., Shan, J., 1996. A Closed-form Solution of the Non-linear Pseudo-ranging Equations (GPS). Artificial Satellites, Planetary Geodesy - No.28, Vol. 31 No.3, Polish Academy of Science, Space Research Centre, pp.133-147.
- [5] Shan, J., 1996. An algorithm for Object Reconstruction without Interior Orientation. Photogrammetry and Remote Sensing, Journal of the International Society for Photogrammetry and Remote Sensing, Vol. 51, pp.299-307.
- [6] Grafarend, E., Shan, J., 1997. Closed-form Solution of P4P or the Three-dimensional Resection Problem in terms of Möbius Barycentric Coordinates. Journal of Geodesy, Official Journal of the International Association of Geodesy, Vol.71, pp.217-231.
- [7] Grafarend, E., Shan, J., 1997. Closed-form Solution to the Twin P4P or the Combined Three Dimensional Resection-intersection Problem in terms of Möbius Barycentric Coordinates. Journal of Geodesy, Official Journal of the International Association of Geodesy, Vol.71, pp.232-239.
- [8] Grafarend, E., Shan, J., 1997. Estimable Quantities in Projective Networks. Zeitschrift für Vermessungswesen (Journal of Surveying, The German Association of Surveying), two parts, Heft 5, pp.218-225, Heft 7, pp.323-333.
- [9] Shan, J., 1997. Photogrammetric Object Description with Projective Invariants. Photogrammetry and Remote Sensing. Journal of the International Society for Photogrammetry and Remote Sensing, Vol.52, pp.222-228.
- [10] Shan, J., 2001. An Approach to Single Image Automatic Orientation and Point Determination by Using Orthoimages and a DTM. The Photogrammetric Record, Journal of the British Remote Sensing and Photogrammetry Society, 17(98), October, 343–353.
- [11] Grafarend, E., Shan, J., 2002. GPS Solutions: Closed Forms, Critical and Special Configurations of P4P. GPS Solutions, Volume 5 (3), pp.29-41.
- [12] Palmer, T.C., Shan, J., 2002. A Comparative Study on Urban Visualization Using Lidar Data in GIS. URISA Journal (Urban and Regional Information Systems Association, U.S.), Vol. 14, No. 2, pp. 19-25.
- [13] Rodarmel, C., Shan, J., 2002. Principal Component Analysis for Hyperspectral Image Classification. Surveying and Land Information Science, Journal of the American Congress on Surveying and Mapping, No. 2, pp.115-122.

- [14] Lee, D.S., Shan, J., Bethel, J.S., 2003. Class-guided Building Extraction from IKONOS Imagery. *Photogrammetric Engineering and Remote Sensing, Journal of the American Society for Photogrammetry and Remote Sensing*, Vol. 69, No. 2, pp. 143-150.
- [15] Lee, D.S., Shan, J., 2003. Combining Lidar Elevation Data and IKONOS Multispectral Imagery for Coastal Classification Mapping. *Marine Geodesy, an International Journal of Ocean Surveys, Mapping and Remote Sensing*, Vol. 26, No.1-2, pp.117-127.
- [16] Shan, J., Zaheer, M., Hussain, E., 2003. Study on Accuracy of 1-Degree DEM versus Topographic Complexity Using GIS Zonal Analysis. *Journal of Surveying Engineering*, American Society of Civil Engineers, Vol. 129, May 1, pp. 85-89.
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  - [45] Xiangyun Hu, Yijing Li, Jie Shan, Jianqing Zhang, Yongjun Zhang, 2014. Road centerline extraction in complex urban scenes from LiDAR data based on multiple features, *IEEE Transaction on Geoscience and Remote Sensing*, Vol. 52, No. 11, pp. 7448-7456
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- [53] Xiangyun Hu, Lizhi Ye, Shiyan Pang, Jie Shan, 2015. Semi-Global Filtering of Airborne Lidar Data for Fast Extraction of Digital Terrain Models, *Remote Sensing*, 7 (8), pp.10996-11015, doi:10.3390/rs70810996
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## **Books**

- [1] Shan, J., 1993. Combined Adjustment of Photogrammetric and Non-photogrammetric Observations (in Chinese, 210,000 Chinese letters). 176 pages. Publishing House of Surveying and Mapping, Beijing, China.
- [2] Shan, J., Toth, C., (Eds.), 2008. Topographic Laser Ranging and Scanning: Principles and Processing, CRC Press/Taylor & Francis Group, 590 pages.
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## **Book chapters**

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- [2] Shan, J., Sampath, A. 2008. Chapter 15, Building Extraction from LiDAR Point Clouds Based on Clustering Techniques, in Shan, J. and Toth, C., Topographic Laser Ranging and Scanning: Principles and Processing, CRC Press/Taylor & Francis Group, pp. 423-446.
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### **Editorial of special issues**

- [1] Kirk, R.L., Shan, J., Guest Editors, 2005. Mapping Mars, Special Issue of Photogrammetric Engineering and Remote Sensing, Journal of the American Society for Photogrammetry and Remote Sensing, October, Vol. 71, No. 10; with Forewords.
- [2] Shan, J., Stilla, U., 2008. Guest Editors, Remote Sensing Data Fusion, Special Issue of Photogrammetric Engineering and Remote Sensing, Journal of the American Society for Photogrammetry and Remote Sensing, Vol. 74, No. 2; with Forewords.
- [3] Shan, J., Jones, B., Eguchi, R., 2011. Guest Editors, Remote Sensing for the Haiti Earthquake, Special Issues of Photogrammetric Engineering and Remote Sensing, Journal of the American Society for Photogrammetry and Remote Sensing, Vol. 77, No. 9 and 10; with Forewords.
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### **Full papers in conference or symposium proceedings**

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- [25] Shan, J., Lee, D.S., Yoon, J.S., 2002. Photogrammetric Registration of MOC imagery with MOLA Data. Joint International Symposium on Geospatial Theory, Processing and Applications Ottawa, Canada, July 8-12.
- [26] Stambouloglou. E., Shan, J., 2002. Building Modeling and Visualization for Urban Environment. Joint International Symposium on Geospatial Theory, Processing and Applications Ottawa, Canada, July 8-12.
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- [35] Yoon, J.S., Shan, J., 2004. Combined Bundle Adjustment of MOC Stereo Images and MOLA Altimetry Data for Precise Mars Topographic Mapping. 20th ISPRS Congress, Istanbul, Turkey, July 12-23.
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- [40] Song, Y.H., Shan, J., 2004. Photorealistic Building Modeling and Visualization in 3-D Geographic Information System. 20th ISPRS Congress, Istanbul, Turkey, July 12-23.
- [41] Song, Y.H., J. Shan, C. Hallam, 2005. Adaptive Terrain Feature Extraction - a case study for Antarctica Lidar DEM, American Society for Photogrammetry and Remote Sensing Annual Conference, Baltimore, Maryland · March 7-11
- [42] Wang, J., J. Shan, 2005. Lidar Data Management with 3-D Hilbert Space-filling Curves, American Society for Photogrammetry and Remote Sensing Annual Conference, Baltimore, Maryland · March 7-11
- [43] Gungor, Oguz and Jie Shan, 2005. A Comparative Study on Wavelet Transform Based Image Fusion Methods Using High Resolution Satellite Images, American Society for Photogrammetry and Remote Sensing Annual Conference, Baltimore, Maryland · March 7-11.
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- [46] Alkheder, Sharaf and Jie Shan, 2005. Urban Growth Simulation – A Case Study of Indianapolis, Indiana GIS 2005 Conference, March 9-10, Indianapolis, IN. (presentation only)
- [47] Du, Qian, Oguz Gungor, Jie Shan, 2005. Performance Evaluation for Pan-sharpening Techniques, Proceedings of IEEE International Geoscience and Remote Sensing Symposium, Vol. 6, pp. 4264-4266, Seoul, Korea, July 25-29, Organized by the Geoscience and Remote Sensing Society of the Institute of Electrical and Electronic Engineers.
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- [52] Sampath, A., Jie Shan, 2006. Building Reconstruction from Lidar Data Based on Clustering Techniques, American Society for Photogrammetry and Remote Sensing Annual Conference, Reno, Nevada, May 1-6
- [53] Gungor, Oguz, Jie Shan, 2006. A Pixel Based Multiple Sensor Image Fusion Approach, American Society for Photogrammetry and Remote Sensing Annual Conference, Reno, Nevada, May 1-6
- [54] Alkheder, Sharaf, Jie Shan, 2006. Fuzzy and Crisp Cellular Automata for Urban Growth Simulation, American Society for Photogrammetry and Remote Sensing Annual Conference, Reno, Nevada, May 1-6
- [55] Song, Y, Jie Shan, 2006. Automated Rock Extraction from Mars Exploration Rover Imagery, American Society for Photogrammetry and Remote Sensing Annual Conference, Reno, Nevada, May 1-6
- [56] Gungor, Oguz, Jie Shan, 2006. An Optimal Fusion Approach for Optical and SAR Images. ISPRS Mid-term Symposium, Commission VII, "Remote Sensing: From Pixels to Processes" Enschede, the Netherlands, May 8-11
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- [63] Sampath, A., Shan, J., 2008. Building Reconstruction from Airborne Lidar Data Based on Clustering Analysis, International Society for Photogrammetry and Remote Sensing Congress, Beijing, China, July 3-11.
- [64] Yonghak Song and Jie Shan, 2008. Building Extraction from Color Imagery based on Edge Flow Driven Active Contour and JSEG, International Society for Photogrammetry and Remote Sensing Congress, Beijing, China, July 3-11.
- [65] Selim Aksoy, Bahadır Ozdemir, Sandra Eckert, Francois Kayitakire, Martino Pesarasi, Orsan Aytekin, Christoph C. Borel, Jan Cech, Emmanuel Christophe, Sebnem Duzgun, Arzu Erener, Kivanc Ertugay, Ejaz Hussain, Jordi Inglada, Sebastien Lefevre, Ozgun Ok, Dilek Koc San, Radim Sara, Jie Shan, Jyothish Soman, Ilkay Ulusoy, Regis Witz, 2008. Performance Evaluation of Building Detection and Digital Surface Model Extraction Algorithms: Outcomes of the PRRS 2008 Algorithm Performance Contest, 978-1-4244-2653-9/08 ©2008 IEEE.
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- [67] Jun Wang, Jie Shan, 2009. Segmentation of LiDAR Point Clouds for Building Extraction, American Society for Photogrammetry and Remote Sensing Annual Conference, Baltimore, Maryland, March 9 – 13.
- [68] Ejaz Hussain, Jie Shan, 2010. Rule inheritance in object-based image classification for urban land cover mapping, American Society for Photogrammetry and Remote Sensing Annual Conference, San Diego, California, April 26-30.
- [69] KyoHyouk Kim, Jie Shan. 2010. Multiphase level set approach to LiDAR roof segmentation, American Society for Photogrammetry and Remote Sensing Annual Conference, San Diego, California, April 26-30.
- [70] Ejaz Hussain, Jie Shan, 2010. Rapid Response: Mapping Floods with Optical and SAR Images, IEEE International Geoscience and Remote Sensing Symposium, Honolulu, Hawaii, July 25-30, 2010.
- [71] Shan, Jie, Hussain, Ejaz., 2010. Very High Resoluiton Remote Sensing Data: Processing Capabilities and Limitation, in the invited session Remote Sensing of Human Settlements, IEEE International Geoscience and Remote Sensing Symposium, Honolulu, Hawaii, July 25-30, 2010.
- [72] KyoHyouk Kim and Jie Shan, 2011. Building Footprints Extraction of Dense Residential Areas from LiDAR data, Annual Conference of the American Society for Photogrammetry and Remote Sensing, Milwaukee, WI., May 1-5, 2011.
- [73] Ejaz Hussaina, Serkan Ural, Abrar Malik, Jie Shan, 2011. Maping Pakistan 2010 Floods Using Rmote Sensing Data, Annual Conference of the American Society for Photogrammetry and Remote Sensing, Milwaukee, WI., May 1-5, 2011.
- [74] KyoHyouk Kim, Jie Shan. 2011. Adaptive Morphological Filtering for DEM Genration, IEEE International Geoscience and Remote Sensing Symposium, Vancourver, Canada, July 24-29, 2011.
- [75] Yuanxin Ye, Lian Xiong, Jie Shan, 2012. Automated Multi-source Remote Sensing Image Registration Based On Phase Congruency, International Archives of the Photogrammetry, Remote Sensing and Spatial Information Sciences, Vol. XXXIX-B3, XXII ISPRS Congress, Melbourne, Australia, 25 Aug. – 01 Sept., pp.367-372
- [76] Jixing Yan, Wanshou Jiang, Jie Shan, 2012. Quality Analysis on RANSAC-based Roof Facets Extraction from Airborne Lidar Data, International Archives of the Photogrammetry, Remote Sensing and Spatial Information Sciences, Vol. XXXIX-B3, XXII ISPRS Congress, Melbourne, Australia, 25 Aug. – 01 Sep., pp.167-172
- [77] Serkan Ural, Jie Shan, 2012. Min-cut Based Segmentation of Airborne Lidar Point Clouds, International Archives of the Photogrammetry, Remote Sensing and Spatial Information Sciences, Vol. XXXIX-B3, XXII ISPRS Congress, Melbourne, Australia, 25 Aug. – 01 Sep., pp.167-172
- [78] Ejaz Hussein, Jie Shan, 2013. Mapping and Monitoring Planned Development of Vegetation Cover in Desert Area using Temporal Remote Sensing Data, ASPRS Annual Conference, Baltimore, MD, March 24-28 (presentation canceled due to physical accident)
- [79] Linglin Zeng, Jie Shan, Daxiang Xiang, 2013. Monitoring Drought Using Multi-sensor Remote Sensing Data in Cropland of Gansu Province, 35th International Symposium on Remote Sensing of Environment, April 22-26, Beijing
- [80] Laigen Dong, Jie Shan, Yuanxin Ye, 2013. An Attempt of Using Straight-line Information for Building Damage Detection Based on Post-earthquake Optical Imagery, 35th International Symposium on Remote Sensing of Environment, April 22-26, Beijing
- [81] Qinghua Li, Serkan Ural, John Anderson, and Jie Shan, 2014. MDL-Based Estimation of the Gaussian Components for LiDAR Waveform Decomposition, International Geoscience and Remote Sensing Symposium (IGARSS), Quebec City, Canada, July 13-18
- [82] Xian Wu, Weihong Cui, Jian Yao, Jie Shan, 2014. Object-based high resolution image classification assisted by semivariogram features, 5th Geographic Object-Based Image Analysis (GEOBIA), May 21-24, 2014, Thessaloniki , Greece
- [83] Serkan Ural, Jie Shan, Mario A. Romero, Andrew Tarko, 2015. Road and Roadside Feature Extraction Using Imagery and LiDAR Data for Transportation Operation, Photogrammetric Image Analysis 2015, March 25-27, Munich, Germany
- [84] Ying Wang, Changqing Huang, Jie Shan, 2015. An Initial Study on College Students' Daily Activities Using GPS Trajectories, The 23<sup>rd</sup> International Conference on Geoinformatics, June 19-21, Wuhan

- [85] Caodong Xie, Zhichao Zhang, Jie Shan, 2015. Technical Evaluation for Mashing-up Crowdsourcing Images, The 23<sup>rd</sup> International Conference on Geoinformatics, June 19-21, Wuhan
- [86] Shenman Zhang, Jie Shan, Zhichao Zhang, Jixing Yan, Yaolin Hou, 2016. Integrating Smartphone Images and Airborne Lidar Data for Complete Urban Building Modelling, ISPRS Annals of the Photogrammetry, Remote Sensing and Spatial Information Sciences, Prague, July 12-19, to appear
- [87] Jixing Yan, Wanshou Jiang, Jie Shan, 2016. A global solution to topological reconstruction for building roof models from airborne lidar point clouds, ISPRS Annals of the Photogrammetry, Remote Sensing and Spatial Information Sciences, Prague, July 12-19, to appear
- [88] Ural Serkan and Jie Shan, 2016. A min-cut based filter for lidar data, ISPRS Archives of the Photogrammetry, Remote Sensing and Spatial Information Sciences, Prague, July 12-19, to appear
- [89] Qinghua Li, Serkan Ural, Jie Shan, 2016. Decomposing LiDAR Waveforms with Nonparametric Classification Methods, IGARSS 2016, Beijing, July 10-15, to appear

### **Reviewer for selected journals**

- [1] Surveying and Land Information Systems, Journal of the American Congress on Surveying and Mapping
- [2] GPS Solutions, Wiley
- [3] GEOMATICA, Canadian Institute of Geomatics
- [4] Acta Geodaetica et Cartographica Sinica
- [5] Marine Geodesy
- [6] Computer-Aided Civil and Infrastructure Engineering
- [7] Automation in Construction
- [8] Journal of Surveying Engineering, ASCE
- [9] Journal of Geophysical Research – Planets
  
- [10] \*Photogrammetric Engineering and Remote Sensing
- [11] \*ISPRS Journal of Photogrammetry and Remote Sensing
- [12] \*International Journal of Remote Sensing
- [13] The Photogrammetric Record, Journal of the British Remote Sensing and Photogrammetry Society
- [14] \*IEEE Transactions on Geoscience and Remote Sensing
- [15] \*IEEE Geoscience and Remote Sensing Letters
- [16] IEEE Journal of Selected Topics in Applied Earth Observations and Remote Sensing
- [17] Remote Sensing of Environment
- [18] Sensors (Open Access Journal, MDPI AG, Switzerland)
- [19] \*Remote Sensing (Open Access Journal, MDPI AG, Switzerland)
- [20] Journal of Applied Remote Sensing
- [21] Canadian Journal of Remote Sensing
- [22] Optical Engineering (SPIE)
- [23] The Institute of Electronics, Information and Communication Engineers (Japan) Transactions
- [24] Electronics and Telecommunications Research Institute (ETRI, Korea) Journal
- [25] Journal of Sensors (Open Access, Hindawi Publishing Corporation)
- [26] PLOS ONE – A peer-reviewed, open access journal
- [27] Optik - International Journal for Light and Electron Optics
- [28] Earth Science Informatics, Springer
- [29] Information Fusion- An International Journal on Multi-Sensor, Multi-Source Information Fusion
- [30] \*International Journal of Image and Data Fusion
  
- [31] \*International Journal of Geographical Information Science
- [32] Journal of Urban and Regional Information Systems Association, USA
- [33] The Annals of Regional Science
- [34] Annals of GIS, Taylor & Francis
- [35] Environmental Modeling and Assessment (Springer)
- [36] Journal of Earth System Science (Springer)
- [37] IBM Journal of Research and Development



- [38] \*Computers & Geosciences
- [39] Machine Vision and Applications
- [40] International Journal of Computational Geometry and Applications
- [41] Bulletin of Geodesy and Geomatics (Bollettino di Geodesia e Scienze Affini)
- [42] Geo-spatial Information Science

### **Reviewer for selected conferences**

- [1] The 3rd International Symposium on Geo-information for Disaster Management; The 100th Canadian Institute of Geomatics Annual Conference
- [2] The international symposium “Mapping without the Sun” — Techniques and Applications of Optical and SAR Imagery Fusion, ISPRS WG Remote Sensing Data Fusion, 25-27 September 2007, Chengdu, China
- [3] ISPRS Congress 2008 Beijing, Commission VII WG 6
- [4] ISPRS Workshop on Laserscanning 2009, full paper
- [5] City Models, Roads, and Traffic 2009, full paper
- [6] ISPRS Commission 7 Symposium, 2010, Vienna, full paper
- [7] ISPRS Commission 3 Symposium, 2010, Paris, full paper
- [8] IGARSS 2011, Sendai Japan (changed to Vancouver of Canada due to Tsunami)
- [9] IGARSS 2013, Melbourne, Australia
- [10] ISPRS Commission 7 Symposium, 2010, Vienna, full papers
- [11] Photogrammetric Computer Vision, ISPRS Commission III Symposium, 2010, Paris, full papers
- [12] IGARSS 2011, Sendai Japan (changed to Vancouver of Canada due to Tsunami)
- [13] IGARSS 2014, Quebec City, Canada
- [14] Photogrammetric Computer Vision, ISPRS Commission III Symposium, 2014, Zurich, Switzerland, full papers
- [15] PIA15 - Photogrammetric Image Analysis, March 25-27, 2015, Munich, Germany, full papers
- [16] HRIGI15 - High-Resolution Earth Imaging for Geospatial Information, March 25-27, 2015, Munich, Germany, full papers
- [17] ISPRS Congress, July 12-19, 2016, Prague, Czech Republic
- [18] IGARSS 2016, Beijing, China

### **Organizer and moderator for selected conferences**

- [1] Session moderator for “LIDAR (Light Detection And Ranging) and Digital Surface Analysis” at the American Society for Photogrammetry and Remote Sensing annual conference, April 23-27, 2001, St. Louis, MO.
- [2] Program Committee, The 3rd ISPRS Workshop on Dynamic and Multi-dimensional GIS, and The 10th Annual Conference of CPGIS on Geoinformatics, May 23-25, 2001. Asian Institute of Technology, Bangkok, Thailand
- [3] Session moderator, Photogrammetry: LIDAR Sensors and Applications 1 (Accuracy), Annual Conference of the American Society for Photogrammetry and Remote Sensing, XXII FIG International Conference, April 19-26, 2002, Washington DC.
- [4] Session moderator, Geospatial Data from Radar/IR/Video Imagery, Annual Conference of the American Society for Photogrammetry and Remote Sensing, May 7, 2003, Anchorage, Alaska.
- [5] Program committee, The 4th ISPRS International Symposium on Mobile Mapping Technology, Kunming, China, August 25-27, 2003 (canceled due to SARS)
- [6] Session moderator, Web based GIS –Distributed Processing, Annual Conference of the American Society for Photogrammetry and Remote Sensing, May 27, 2004, Denver, CO.
- [7] Session moderator, “Analysis Tools & Techniques: Imagery Accuracy and Performance Metrics - Part 1”; “GIS Data Processing - Part 4: GIS Error Propagation”, Annual Conference of the American Society for Photogrammetry and Remote Sensing, March 7-11, 2005, Baltimore, Maryland
- [8] Program Committee, 13th International Conference on Geoinformatics, Toronto, August 17-19, 2005
- [9] Session chair, “Photogrammetry and Image Analysis”; Pecora 16 Global Priorities in Land Remote Sensing, Sioux Falls, SD, October 23-27, 2005
- [10] Program Committee, International Workshop on Disaster Monitoring and Assessment Through Images,

November 4- 6, 2005, Bangkok, Thailand

- [11] Session moderator, "Lidar / 3D IV - Building Extraction"; "Modeling Urban Growth with Remote Sensing & GIS", Annual Conference of the American Society for Photogrammetry and Remote Sensing, May 1-5, 2006, Reno, Nevada
- [12] Technical Session Co-chair, "Technical Session 7: Remote Sensing Data Fusion"; "Technical Session 17: Processing Multi-temporal Data and Change Detection". Remote Sensing: From Pixels to Processes, Symposium of Commission VII of the International Society for Photogrammetry and Remote Sensing, May 8-11, 2006, Enschede, The Netherlands
- [13] URBAN 2007 Technical Committee, IEEE, ISPRS, April 11-13, 2007. Paris, France
- [14] Technical Program Committee of the "Joint Canadian Institute of Geomatics (CIG)/International Society for Photogrammetry and Remote Sensing (ISPRS) Conference on Geomatics for Disaster and Risk Management", May 23-25, 2007, Toronto, Canada
- [15] Organizing Committee, ISPRS Workshop on Updating Geo-spatial Databases with Imagery & The 5th International Workshop on DMGISs, August 28-29, 2007, Urumchi, Xingjiang, China
- [16] Scientific Committee, ISPRS Conference on Techniques and Applications of Optical and SAR Imagery Fusion, International Society for Photogrammetry and Remote Sensing, September 25-27, 2007, Chengdu, China
- [17] Program Committee, International Workshop on Earth Observation and Remote Sensing Applications, June 30 - July 2, 2008, Beijing, China
- [18] Session chair, International Society for Photogrammetry and Remote Sensing Congress, July 3-11, 2008, Beijing, China
- [19] Program Committee, International Conference on Earth Observation Data Processing and Analysis, Dec. 28-30, 2008, Wuhan, China
- [20] Scientific Committee, The 2nd International Conference on Earth Observation for Global Change, May 25-29, 2009, Chengdu, China
- [21] Program Committee, Laserscanning 2009, International Society for Photogrammetry and Remote Sensing Workshop, Sept. 1-2, 2009, Paris, France
- [22] Program Committee, City Models, Roads, and Traffic 2009 (CMRT09), joint conference of International Society for Photogrammetry and Remote Sensing Working Groups III/4 and III/5, Sept. 3-4, 2009, Paris, France
- [23] Program Committee, Photogrammetric Computer Vision and Image Analysis, ISPRS Commission III Symposium, Sept. 1-3, 2010, Paris, France
- [24] Technical Committee, Annual Conference of the American Society for Photogrammetry and Remote Sensing, May 1-5, 2011, Milwaukee, Wisconsin
- [25] Scientific Committee, IEEE/GRSS International Geoscience and Remote Sensing Symposium (IGARSS), July 22-27, 2012, Munich, Germany
- [26] Program Committee, Workshop on Pattern Recognition in Remote Sensing (PRRS), International Association of Pattern Recognition (IAPR), Tsukuba Science City, Japan, 11 Nov. 2012
- [27] Scientific Committee, International Conference on Computer Vision in Remote Sensing (CVRS2012), Dec.16-18, 2012, Xiamen, China
- [28] Program Committee, ISPRS International Workshop on Virtual City Modeling (VCM), May 28-31, 2013, Regina, Canada.
- [29] Program Committee, Workshop on Pattern Recognition in Remote Sensing (PRRS), International Association of Pattern Recognition (IAPR), Stockholm, Sweden, August 24, 2014 (in conjunction with ICPR 2014)
- [30] Scientific Committee, ISPRS TC VII Mid-term Symposium, Sept. 29- Oct 2, 2014, Istanbul, Turkey
- [31] Program Committee, Land Surface Remote Sensing II, SPIE Asia-Pacific Remote Sensing, Beijing, Oct. 13-16, 2014
- [32] Session Chair, Urban, SPIE Asia-Pacific Remote Sensing, Beijing, Oct. 13-16, 2014
- [33] Program Committee, Photogrammetric Image Analysis, and High-Resolution Earth Imaging for Geospatial Information, March 25-27, 2015, Munich, Germany
- [34] Session Chair, Advances in Automated Feature Extraction, The Imaging & Geospatial Technology Forum, ASPRS Annual Meeting, Tampa, FL., May 6, 2015
- [35] Program Committee, ISPRS Geospatial Week 2015, La Grande Motte, France, Sept. 28 – Oct. 2, 2015.
- [36] Scientific Committee, IEEE/GRSS International Geoscience and Remote Sensing Symposium (IGARSS), July 10-15, 2016, Beijing, China