

2017 Symposium on Information Theory and Signal Processing in the Benelux

May 11-12, 2017, Delft University of Technology, Delft, the Netherlands

TU Delft Science Centre, Mekelzaal

<http://cas.tudelft.nl/sitb2017>



PROGRAM

(version May 9, 2017)

Thursday May 11, 2017

- 09.15-10.00 Registration, Coffee/Tea
- 10.00-10.05 Opening
- 10.05-10.50 Keynote 1
- 10.50-11.10 Coffee/Tea Break
- 11.10-12.30 Oral Session 1
- 12.30-13.30 Lunch Break
- 13.30-14.50 Oral Session 2
- 14.50-15.10 Coffee/Tea Break
- 15.10-16.45 Poster Session 1
- 16.45-17.45 WIC General Assembly
- 18.00-.... Botanical Garden: Tour + BBQ dinner

Friday May 12, 2017

- 09.00-09.30 Coffee/Tea
- 09.30-10.30 Keynote 2
- 10.30-10.50 Coffee/Tea Break
- 10.50-12.10 Oral Session 3
- 12.10-12.45 Poster Session 2
- 12.45-13.30 Lunch Break
- 13.30-14.00 Poster Session 2 (continued)
- 14.00-15.20 Oral Session 4
- 15.20-15.40 Coffee/Tea/Drinks Break
- 15.40-15.50 Awards Ceremony and Closure

Details on next pages!

Thursday May 11, 2017

09.15-10.00 Registration, Coffee/Tea

10.00-10.05 Opening

10.05-10.50 Keynote 1 (chair: Jos Weber)

“Progress in Constrained Codes”
K. Schouhamer Immink

10.50-11.10 Coffee/Tea Break

11.10-12.30 Oral Session 1 (chair: *Arie Koppelaar*)

11.10-11.30
“Ternary Manchester: A Modulation Code for Low-Rate Visible Light Communication”,
S. Baggen, D. Sekulovski, M. Perz

11.30-11.50
“An Automated Tool for Rotational-XOR Cryptanalysis of ARX-based Primitives”,
G. De Witte, T. Ashur, Y. Liu

11.50-12.10
“Towards understanding behavioural biometric recognition performance over time and practice”,
E. Haasnoot, J. Barnhoorn, L. Spreeuwers, R. Veldhuis, W. Verwey

12.10-12.30
“Privacy concerns and protection measures in online behavioural advertising”,
L. Helsloot, G. Tillem, Z. Erkin

12.30-13.30 Lunch Break

13.30-14.50 Oral Session 2 (chair: *Stan Baggen*)

13.30-13.50
“Adaptive quantization for speech enhancement in wireless acoustic sensor networks”,
F. de la Hucha Arce, M. Moonen, M. Verhelst, A. Bertrand

13.50-14.10
“Quantisation of multilevel signals for Viterbi decoders on AWGN and fading channels”,
A. Koppelaar

14.10-14.30
“Low Complexity Symbol-Level Design for Linear Precoding Systems”,
J. Krivochiza, A. Kalantari, S. Chatzinotas, B. Ottersten

14.30-14.50
“Caching of Bivariate Gaussians with Non-Uniform Preference Probabilities”,
G. Op ’t Veld, M. Gastpar

14.50-15.10 Coffee/Tea Break

15.10-16.45 Poster Session 1

“Rate-Constrained Beamforming in Binaural Hearing Aids”,
J. Amini, R. Hendriks, R. Heusdens, M. Guo, J. Jensen

“Windowed Factorization and Merging”,
B. van den Berg, I. Wanders

“Automatic Tuning of a Ring Resonator-Based Optical Delay Line for Optical Beamforming”,
L. Blik, H. Verstraete, S. Wahls, R. Timens, R. Oldenbeuving, C. Roeloffzen, M. Verhaegen

“The Amount as a Predictor of Transaction Fraud”,
N. Bouman

“Efficient Key Generation Scheme for SRAM-PUFs using Polar Codes”,
B. Chen, T. Ignatenko, F. Willems

“Near-Optimal Greedy Sensor Selection for MVDR Beamforming with Modular Budget Constraint”,
M. Coutino, S. Chepuri, G. Leus

“Directivity assessment of MEMS microphones in microphone array applications”,
B. Cox, B. Thoen, V. Rijmen, L. Van der Perre, L. De Strycker

“More Constructions for Strong 8-bit S-boxes with Efficient Masking in Hardware”,
L. De Meyer, K. Varici

“A Game Theoretic Approach to Spectrum Pricing in Two-Tier HetNets with Incomplete Information”,
A. Guevara, A. Chiumento, S. Pollin

“Massive MIMO Systems Can Deliver Great Performance with Coarsely Quantized Signals”,
S. Gunnarsson, M. Bortas, Y. Huang, C. Chen, L. Van der Perre, O. Edfors

“Deep Verification Learning”,
F. Hillerström, R. Veldhuis, L. Spreeuwerts

“Binaural beamforming without estimating relative acoustic transfer functions”,
A. Koutrouvelis, R. Hendriks, R. Heusdens, J. Jensen, M. Guo

“Behavior of temperature dependent SRAM-PUFs, and consequences for secret-key capacity”,
L. Kusters, T. Ignatenko, F. Willems

“Treatment delineation impact on Gamma Knife radiosurgical response of vestibular schwannoma”,
P. Langenhuizen, Y. Zeng, S. Zinger, H. Verheul, S. Leenstra, P. de With

16.45-17.45 WIC General Assembly

18.00-.... Botanical Garden: Tour + BBQ dinner

Guided tour through the TU Delft Botanical Garden (<http://botanischetuin.tudelft.nl/en/>);
We will meet at the entrance at 18.00 hrs (Poortlandplein 6, next to the Science Centre);
After the tour we will have drinks and dinner (BBQ style) in the garden.

Friday May 12, 2017

09.00-09.30 Coffee/Tea

09.30-10.30 Keynote 2 (*chair: Richard Heusdens*)

“Semidefinite programming methods for continuous sparse optimization”,
L. Vandenbergh

10.30-10.50 Coffee/Tea Break

10.50-12.10 Oral Session 3 (*chair: Luuk Spreeuw*)

10.50-11.10

“Complex Factor Analysis and Extensions”,
A. Sardarabadi, A. van der Veen

11.10-11.30

“Bootstrapping CNNs for Building Segmentation in Aerial Imagery with Depth”,
C. Sebastian, B. Boom, T. van Lankveld, P. de With

11.30-11.50

“A Lower Bound on Causal and Zero-delay Rate Distortion for Scalar Gaussian Autoregressive Sources”,
P. Stavrou, J. Ostergaard

11.50-12.10

“Identification of Large-Scale Vector-AutoRegressive models with Kronecker modeling”,
B. Sinqin, M. Verhaegen

12.10-12.45 Poster Session 2 (to be continued after the lunch break!)

“Privacy-Preserving Collection and Retrieval of Medical Wearables Data”,
C. Maulany, M. Nateghizad, Z. Erkin

“Improving EEG signal quality through spatial filtering of combined data from multiple miniature EEG devices”,
A. Mundanad Narayanan, A. Bertrand

“An Autonomous Decision Making Flooding Contention Scheme Based on Spatial Correlation”,
Y. Murillo, F. Rosas, S. Pollin

“Fast radioastronomical image reconstruction using prior conditioning”,
S. Naghibzadeh, A. van der Veen

“Privacy-Preserving Equality Test”,
M. Nateghizad, Z. Erkin, R. Lagendijk

“Security analysis of RRDPS Quantum Key Distribution”,
B. Skoric

“Quantum Key Recycling without quantum computers”,
B. Skoric, M. de Vries

“Binary puzzle as a SAT problem”,
P. Utomo, R. Pellikaan

“Analyses on privacy enhancing properties in Smart Home ecosystems”,
R. Vrooman, C. Ugwuoke, R. Verbij, Z. Erkin

“Gaussian Process Optimization of an expensive function with stochastic binary observations using expected entropy”,

X. Wang, T. Tjalkens, J. Linnartz

“Spatial filtering-based template matching for efficient and accurate spike sorting with high-density neuroprobes”,

J. Wouters, F. Kloosterman, A. Bertrand

“Instrumental-Variable Nuclear-Norm Subspace Identification (IV-N2SID)”,

C. Yu, M. Verhaegen

“Microphone Subset Selection for Spatial Filtering Based Noise Reduction with Multiple Target Sources”,

J. Zhang, R. Hendriks, R. Heusdens

“Autoregressive Moving Average Graph Filters: a Stable Distributed Implementation”,

E. Isufi, A. Loukas, G. Leus

12.45-13.30 Lunch Break

13.30-14.00 Poster Session 2 (continued)

14.00-15.20 Oral Session 4 (*chair: Liesbet Van der Perre*)

14.00-14.20

“Alternative Spectral Minutiae Representations For Fingerprint Verification”,

T. Stanko, B. Skoric

14.20-14.40

“On the Relationship Between PDMM and a Distributed ADMM Variant”,

T. Sherson, R. Heusdens, W. Kleijn

14.40-15.00

“Information Reception in Dense Cellular Networks of Joint Illumination and VLC Sources”,

A. Tsiatmas, F. Willems, S. Baggen

15.00-15.20

“Dimming Robustness of SEPM for VLC: Assessment and Experimental Validation”,

K. Verniers, J. Beysens, L. Van der Perre, S. Pollin, N. Stevens

15.20-15.40 Coffee/Tea/Drinks Break

15.40-15.50 Awards Ceremony and Closure