

Tuesday, December 6	
9:00-10:00	<u>Overview Talk II</u> Patrick Le Callet
10:00-10:20	Coffee Break
10:20-13:00	Special Session II: Video Compression Technology beyond HEVC
<b>10:20</b>	<u>Improved Intra Prediction Method Based on Arbitrary Reference Tier Coding Schemes</u> Yao-Jen Chang (Industrial Technology Research Institute, Taiwan); Po-Han Lin, Jih-Sheng Tu and Ching-Chieh Lin (ITRI, Taiwan); Chun-Lung Lin (Industrial Technology Research Institute, Taiwan)
<b>10:40</b>	<u>Decoder-side Intra Mode Derivation for Block-based Video Coding</u> Xiaoyu Xiu (InterDigital Communications Inc. & IDCC, USA); Yuwen He (InterDigital Communications Inc., USA); Yan Ye (Interdigital Communications, USA, USA)
<b>11:00</b>	<u>BIO performance complexity trade-off</u> Elena Alshina (Samsung Electronics & DMC R&D Center, Korea)
<b>11:20</b>	<u>Generalized Bi-prediction Method for Future Video Coding</u> Chun-Chi Chen (InterDigital Communications, Inc., USA & National Chiao Tung University, Taiwan); Xiaoyu Xiu (InterDigital Communications Inc. & IDCC, USA); Yuwen He (InterDigital Communications Inc., USA); Yan Ye (Interdigital Communications, USA, USA)
<b>11:40</b>	<u>Distance Scaling of Higher Order Motion Parameters in an Extension of HEVC</u> Cordula Heithausen, Max Blaeser and Mathias Wien (RWTH Aachen University, Germany)
<b>12:00</b>	<u>NSST: Non-Separable Secondary Transform for Next Generation Video Coding</u> Xin Zhao (Qualcomm Technology Inc., USA); Jianle Chen (Qualcomm, USA); Amir Said (Qualcomm Technologies Inc., USA); Vadim Seregin and Hilmi Egilmez (Qualcomm Technology Inc., USA); Marta Karczewicz (Qualcomm, USA)
<b>12:20</b>	<u>Highly Efficient Non-Separable Transforms for Next Generation Video Coding</u> Amir Said (Qualcomm Technologies Inc., USA); Xin Zhao (Qualcomm Technology Inc., USA); Marta Karczewicz (Qualcomm, USA); Hilmi Egilmez and Vadim Seregin (Qualcomm Technology Inc., USA); Jianle Chen (Qualcomm, USA)
<b>12:40</b>	<u>Geometry Transformation-based Adaptive In-Loop Filter</u> Marta Karczewicz (Qualcomm, USA); Li Zhang and Wei-Jung Chien (Qualcomm Technologies Inc., USA); Xiang Li (Qualcomm, USA)
13:00-14:00	Lunch Break
14:00-15:00	Adaptive Transforms
<b>14:00</b>	<u>Improved Coefficient Coding for Adaptive Transforms in HEVC</u> Saurabh Puri (University of Nantes & Technicolor, France); Sebastien Lasserre (Technicolor, France); Patrick Le Callet (Université de Nantes, France)
<b>14:15</b>	<u>Low-Complexity Adaptive Multiple Transforms for post-HEVC Video Coding</u> Thibaud Biatek (BCom & IETR/INSA Rennes, France); Victorien Lorcy, Pierre Castel and Pierrick Philippe (IRT bcom, France)

<b>14:30</b>	<u>Block Adaptive Selection of Multiple Core Transforms for Video Coding</u> Santiago De-Luxán-Hernández (Fraunhofer Heinrich-Hertz-Institut); Detlev Marpe (Fraunhofer Institute for Telecommunications - Heinrich Hertz Institute, Germany); Heiko Schwarz (Fraunhofer HHI, Germany); Klaus-Robert Müller (Machine Learning Laboratory, Berlin Institute of Technology, Berlin, Germany); Mathias Wien and Jens-Rainer Ohm (RWTH Aachen University, Germany); Thomas Wiegand (Fraunhofer HHI, Germany)
<b>14:45</b>	<u>Symmetric Line Graph Transforms for Inter Predictive Video Coding</u> Keng-Shih Lu and Antonio Ortega (University of Southern California, USA)
15:00-17:00	Poster Session II & Coffee
17:00-18:00	Learning and Optimization in Visual Coding
<b>17:00</b>	<u>Graph Transform Learning for Image Compression</u> Giulia Fracastoro (Politecnico di Torino, Italy); Dorina Thanou (Swiss Federal Institute of Technology, Lausanne, Switzerland); Pascal Frossard (EPFL, Switzerland)
<b>17:15</b>	<u>Video Representation and Coding Using a Sparse Steered Mixture-of-Experts Network</u> Lieven Lange (Technische Universität Berlin, Germany); Ruben Verhack (Ghent University - iMinds - Multimedia Lab & Technische Universität Berlin - Communication Systems Lab, Belgium); Thomas Sikora (Technische Universität Berlin, Germany)
<b>17:30</b>	<u>Optimized Decoding of JPEG Images Based on Generalized Graph Laplacians</u> Sean Young, Aous T. Naman, Reji K Mathew and David Taubman (University of New South Wales, Australia)
<b>17:45</b>	<u>L1-Regularized Optimization of Undersampled Prefilters for Image Coding</u> Masaki Onuki and Yuichi Tanaka (Tokyo University of Agriculture and Technology, Japan)
19:00-22:00	Social Event

Poster Session	No.	Poster	Author
II	1	<u>Invariance against local affine deformation for feature based object detection systems</u>	Christopher Bulla and Jens-Rainer Ohm (RWTH Aachen University, Germany)
II	2	<u>Robust Local Optical Flow: Dense Motion Vector Field Interpolation</u>	Jonas Geistert (Technische Universität Berlin); Tobias Senst and Thomas Sikora (Technische Universität Berlin, Germany)
II	3	<u>Feature-based Video Coding: Designing an RD Efficient and Search Friendly Framework</u>	Renam C. da Silva (Federal University of Rio de Janeiro, Brazil); Eduardo A. B. da Silva (Universidade Federal do Rio de Janeiro & COPPE, Brazil); Fernando Pereira (Instituto Superior Técnico - Instituto de Telecomunicações & Universidade de Lisboa, Portugal)
II	4	<u>Fast Motion Estimation Based on Neighbouring Cost Similarity</u>	Ivan Zupancic (Queen Mary University of London, United Kingdom); Ebroul Izquierdo (Queen Mary, University of London, United Kingdom)
II	5	<u>Texture-Dependent Frequency Selective Reconstruction of Non-Regularly Sampled Images</u>	Markus Jonscher (Friedrich-Alexander-Universität Erlangen-Nürnberg (FAU), Germany); Jürgen Seiler and Andre Kaup (University of Erlangen-Nuremberg, Germany)
II	6	<u>Complexity-Scalable HEVC Encoding</u>	Mateus Grellert (Federal University of Rio Grande do Sul, Brazil); Bruno Zatt (Federal University of Pelotas, Brazil); Sergio Bampi (Federal University of Rio Grande do Sul & Microelectronics Group at UFRGS, Brazil)
II	7	<u>Hash Image Transform for Accelerated Screen Content Encoding in HEVC</u>	Eugen Wige, Steffen Schulze and Alexander Gehlert (Citrix Mobility Apps, Germany)
II	8	<u>Fast CU Split Decisions for HEVC Inter Coding Using Support Vector Machines</u>	Andreas Heindel and Thomas Haubner (Friedrich-Alexander University Erlangen-Nürnberg (FAU), Germany); Andre Kaup (University of Erlangen-Nuremberg, Germany)
II	9	<u>Low complexity perceptual image coding by just-noticeable difference model based adaptive downsampling</u>	Zhe Wang, Yousef Baroud, Seyyed Mahdi Najmabadi and Sven Simon (University of Stuttgart, Germany)
II	10	<u>Recursive interpolation filters for video coding</u>	Nikolay Shlyakhov (Intel Corporation, Russia); Miroslav Goncharenko (Intel & Lomonosov Moscow State University, Russia); Jon Recker (Intel Corp., USA); Alexei Leonenko (Intel, Russia)
II	11	<u>Image Error Concealment using Sparse Representations over a Trained Dictionary</u>	Ali Akbari (University of Sorbonne, France); Bertrand Granado (UPMC, France); Maria Trocan (I. S. E. P., France)

II	12	<u>A Proof-of-Concept Framework for PDE-Based Video Compression</u>	Sarah Andris (Saarland University, Germany); Pascal Peter (Saarland University - Germany); Joachim Weickert (Saarland University - Germany)
II	13	<u>Local Entropy Minimization and Measurement Rate Allocation for Compressed Sensing of Depth Video</u>	Shengwei Wang (Huazhong University of Science and Technology, P.R. China); Li Yu (Huazhong University of Science & Technology, P.R. China)
II	14	<u>Optimized HEVC Encoding with Complexity Constraints</u>	Meiyuan Fang (Multimedia lab, Tsinghua University, P.R. China); Jiangtao Wen (Tsinghua University, P.R. China)
II	15	<u>Comparing temporal behavior of fast objective video quality measures on a large-scale database</u>	Ahmed Aldahdooh (University of Nantes, France); Enrico Masala (Politecnico di Torino, Italy); Glenn Van Wallendael (Ghent University - iMinds, Belgium); Marcus Barkowsky (University of Nantes, France)
II	16	<u>Constant-Slope Rate Allocation for Distributed Real-World Encoding</u>	Jan De Cock and Anne Aaron (Netflix, USA)
II	17	<u>Joint Shape and Centroid Adaptive Frequency Selective Extrapolation for the Reconstruction of Arbitrarily Shaped Loss Areas</u>	Michel Bätz (Friedrich-Alexander-Universität Erlangen-Nürnberg (FAU), Germany); Wolfgang Schnurrer (University of Erlangen-Nuremberg, Germany); Jan Koloda (Friedrich-Alexander University, Germany); Andrea Eichenseer (Friedrich-Alexander-Universität Erlangen-Nürnberg (FAU), Germany); Andre Kaup (University of Erlangen-Nuremberg, Germany)