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Gang Hua · Hervé Jégou (Eds.)

Computer Vision – ECCV 2016 Workshops

Amsterdam, The Netherlands, October 8–10 and 15–16, 2016
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Foreword

Welcome to the proceedings of the 2016 edition of the European Conference on Computer Vision held in Amsterdam! It is safe to say that the European Conference on Computer Vision is one of the top conferences in computer vision. It is good to reiterate the history of the conference to see the broad base the conference has built in the 13 editions. First held in 1990 in Antibes (France), it was followed by subsequent conferences in Santa Margherita Ligure (Italy) in 1992, Stockholm (Sweden) in 1994, Cambridge (UK) in 1996, Freiburg (Germany) in 1998, Dublin (Ireland) in 2000, Copenhagen (Denmark) in 2002, Prague (Czech Republic) in 2004, Graz (Austria) in 2006, Marseille (France) in 2008, Heraklion (Greece) in 2010, Florence (Italy) in 2012, and Zürich (Switzerland) in 2014.

For the 14th edition, many people worked hard to provide attendees with a most warm welcome while enjoying the best science. The Program Committee, Bastian Leibe, Jiri Matas, Nicu Sebe, and Max Welling, did an excellent job. Apart from the scientific program, the workshops were selected and handled by Hervé Jégou and Gang Hua, and the tutorials by Jacob Verbeek and Rita Cucchiara. Thanks for the great job. The coordination with the subsequent ACM Multimedia offered an opportunity to expand the tutorials with an additional invited session, offered by the University of Amsterdam and organized together with the help of ACM Multimedia.

Of the many people who worked hard as local organizers, we would like to single out Martine de Wit of the UvA Conference Office, who delicately and efficiently organized the main body. Also the local organizers Hamdi Dibeklioglu, Efstratios Gavves, Jan van Gemert, Thomas Mensink, and Mihir Jain had their hands full. As a venue, we chose the Royal Theatre Carré located on the canals of the Amstel River in downtown Amsterdam. Space in Amsterdam is sparse, so it was a little tighter than usual. The university lent us their downtown campuses for the tutorials and the workshops. A relatively new thing was the industry and the sponsors for which Ronald Poppe and Peter de With did a great job, while Andy Bagdanov and John Schavemaker arranged the demos. Michael Wilkinson took care to make Yom Kippur as comfortable as possible for those for whom it is an important day. We thank Marc Pollefeys, Alberto del Bimbo, and Virginie Mes for their advice and help behind the scenes. We thank all the anonymous volunteers for their hard and precise work. We also thank our generous sponsors. Their support is an essential part of the program. It is good to see such a level of industrial interest in what our community is doing!

Amsterdam does not need any introduction. Please emerge yourself but do not drown in it, have a nice time.

October 2016

Theo Gevers
Arnold Smeulders

Preface

It is our great pleasure to present the workshop proceedings of the 14th European Conference on Computer Vision, which was held during October 8–16, 2016, in Amsterdam, The Netherlands. We were delighted that the main conference of ECCV 2016 was accompanied by 26 workshops. The workshop proceedings are presented in multiple Springer LNCS volumes.

This year, the 2016 ACM International Conference on Multimedia was collocated with ECCV 2016. As a synergistic arrangement, four out of the 26 ECCV workshops, whose topics are of interest to both the computer vision and multimedia communities, were held together with selected 2016 ACM Multimedia workshops.

We received 44 workshop proposals on a broad set of topics related to computer vision. The high quality of the proposals made the selection process rather difficult. Owing to space limitation, 27 proposals were accepted, among which two proposals were merged to form a single workshop due to overlapping themes.

The final 26 workshops complemented the main conference program well. The workshop topics present a good orchestration of new trends and traditional issues, as well as fundamental technologies and novel applications. We would like to thank all the workshop organizers for their unreserved efforts to make the workshop sessions a great success.

October 2016

Hervé Jégou
Gang Hua

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W02 — Visual Analysis of Sketches

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W03 — Biological and Artificial Vision

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H. Steven Scholte	University of Amsterdam, The Netherlands
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W04 — Brave New Ideas For Motion Representations

Efstratios Gavves	University of Amsterdam, The Netherlands
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W05 — Joint ImageNet and MS COCO Visual Recognition Challenge

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W07 — Action and Anticipation for Visual Learning

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Kristen Grauman	University of Texas at Austin, USA
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W08 — Computer Vision for Road Scene Understanding and Autonomous Driving

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Mathieu Salzmann	Ecole Polytechnique Fédérale de Lausanne, Switzerland
Lars Petersson	NICTA, Australia
Fredrik Kahl	Chalmers University of Technology, Sweden
Bart Nabbe	Faraday Future, USA

W09 — Challenge on Automatic Personality Analysis

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Isabelle Guyon	Université Paris-Saclay, France, and ChaLearn, USA
Hugo Jair Escalante	INAOE, Mexico
Víctor Ponce López	Computer Vision Center (UAB) and University of Barcelona, Spain

W10 — BioImage Computing

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Thierry Péicot	Inria, France
Pietro Perona	California Institute of Technology, USA
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W11 — Benchmarking Multi-Target Tracking: MOTChallenge

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Anton Milan	University of Adelaide, Australia
Konrad Schindler	ETH Zürich, Switzerland
Daniel Cremers	TU Munich, Germany
Ian Reid	University of Adelaide, Australia
Stefan Roth	TU Darmstadt, Germany

W12 — Assistive Computer Vision and Robotics

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Mohan Trivedi	University of California, San Diego, USA

W13 — Transferring and Adapting Source Knowledge in Computer Vision

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W14 — Recovering 6D Object Pose

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W15 — Robust Reading

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W16 — 3D Face Alignment in the Wild and Challenge

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Laszlo Jeni	Carnegie Mellon University, USA
Nicu Sebe	University of Trento, Italy
Sergey Tulyakov	University of Trento, Italy
Lijun Yin	Binghamton University, USA

W17 — Egocentric Perception, Interaction, and Computing

Giuseppe Serra	University of Modena and Reggio Emilia, Italy
Rita Cucchiara	University of Modena and Reggio Emilia, Italy
Walterio Mayol-Cuevas	University of Bristol, UK
Andreas Bulling	Max Planck Institute for Informatics, Germany
Dima Damen	University of Bristol, UK

W18 — Local Features: State of the Art, Open Problems, and Performance Evaluation

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Tinne Tuytelaars	KU Leuven, Belgium
Andrea Vedaldi	University of Oxford, UK
Vassileios Balntas	Imperial College London, UK
Karel Lenc	University of Oxford, UK

W19 — Crowd Understanding

François Brémond	Inria Sophia Antipolis, France
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Andrea Cavallaro	Queen Mary University of London, UK
Tomas Pajdla	Czech Technical University, Czech Republic
Petr Palatka	Neovision, Czech Republic
Jana Trojanova	Honeywell ACS Global Labs Prague, Czech Republic

W20 — Video Segmentation

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Fuxin Li	Oregon State University, USA
James M. Rehg	Georgia Institute of Technology, USA
Bernt Schiele	Max Planck Institute Informatics and Saarland University, Germany
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W21 — The Visual Object Tracking Challenge Workshop

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W22 — Web-Scale Vision and Social Media

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W23 — Computer Vision for Audio visual Media

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W24 — Computer Vision for Art Analysis

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W25 — Virtual/Augmented Reality for Visual Artificial Intelligence

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David Vázquez	CVC and Universitat Autònoma de Barcelona, Spain
Hao Su	Stanford University, USA
Florent Perronnin	Facebook AI Research (FAIR), France

W26 — Joint Workshop on Storytelling with Images and Videos and Large-Scale Movie Description and Understanding Challenge

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Leonid Sigal	Disney Research Pittsburgh, USA
Kristen Grauman	University of Texas at Austin, USA
Tamara Berg	University of North Carolina at Chapel Hill, USA
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Christopher Pal	École Polytechnique de Montréal, Canada
Aaron Courville	Université de Montréal, Canada
Bernt Schiele	Max Planck Institute for Informatics, Germany

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