

ENLG 2015

**Proceedings of the
15th European Workshop
on
Natural Language Generation**

10-11 September 2015
University of Brighton
Brighton, UK

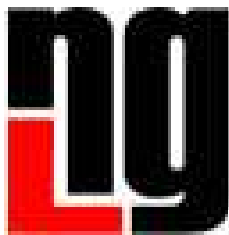
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Introduction

We are pleased to present the papers accepted for presentation at the 15th European Workshop on Natural Language Generation (ENLG 2015), to be held on 10th and 11th September in Brighton, UK.

ENLG is a biennial series, which started with a workshop in Royaumont, France in 1987 and was most recently held in Sofia, Bulgaria in 2013. Together with the International Conference on Natural Language Generation (INLG), held in alternate years, ENLG is the main forum for research on all aspects of the generation of natural language.

This year, ENLG has a special theme on Image and Video Description. Vision and Language more generally has, over the past five years, become a research field in its own right, a development reflected for example in the recently introduced Vision and Language areas at ACL and EMNLP. Image and video description is the obvious vision and language application for NLG and with this special theme we are aiming both to provide a forum for existing work and to stimulate new research. We are delighted to have two invited speakers addressing the special theme in different ways. Mirella Lapata reports her work investigating how best to interpret and verbalise visual information, while Pinar Duygulu-Sahin provides a broader overview of image and video description work with a focus on weakly labelled images.

We received a total of 41 submissions for the workshop, from all over the world — not only Europe, but North and South America, Asia and Australasia — and accepted 11 as long papers for oral presentation, 13 as short papers for poster presentation, and 3 as demos. This volume contains all the accepted papers, as well as the abstracts by the two invited speakers.

We would like to thank all the authors who submitted papers, and the members of our program committee, for helping to ensure the high standard and continuing health of ENLG 2015 and of NLG research in general.

Anja Belz, Albert Gatt, François Portet and Matthew Purver

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Leo Wanner (ICREA and University Pompeu Fabra, Spain)
Michael White (The Ohio State University, USA)

Invited Speakers

Pinar Duygulu-Sahin (Hacettepe University, Turkey):

Words and Pictures: Mining Weakly Labeled Web Images and Videos for Automatic Concept Learning

The increasing number of images and videos resulted in new challenges for computer vision community. The requirement for manual labeling continues to be one of the most important limitations in large scale recognition. Alternatively, massive amount of images and videos with annotated metadata or descriptions are available on the Web. Although incomplete and errorful, availability of these annotations recently attracted many researchers to build (semi-)automatic methods to learn from weakly labeled data. However, images on the web are “in the wild” resulting in challenges that makes the data collections gathered from web different from the hand crafted datasets.

In this talk, first I will discuss the challenges in learning from weakly labeled images, Then, I will describe our recent efforts on recognition of visual attributes, as well as objects, scenes and faces on the large scale using weakly labeled images. Going beyond images, finally I will briefly discuss the issues in videos.

Mirella Lapata (University of Edinburgh, UK):

Learning to Interpret and Describe Abstract Scenes

Given a (static) scene, a human can effortlessly describe what is going on (who is doing what to whom, how, and why). The process requires knowledge about the world, how it is perceived, and described. In this talk I will focus on the problem of interpreting and verbalizing visual information using abstract scenes created from collections of clip art images. I will introduce a model inspired by machine translation (where the task is to transform a source sentence into its target translation) and argue that generating descriptions for scenes is quite similar, but with a twist: the translation process is very loose and selective; there will always be objects in a scene not worth mentioning, and words in a description that will have no visual counterpart.

Our key insight is to represent scenes via visual dependency relations corresponding to sentential descriptions. This allows us to create a large parallel corpus for training a statistical machine translation system, which we interface with a content selection component guiding the translation toward interesting or important scene content. Advantageously, our model can be used in the reverse direction, i.e., to generate scenes, without additional engineering effort. Our approach outperforms a number of competitive alternatives, when evaluated both automatically and by humans. Joint work with Luis Gilberto Mateos Ortiz, Carina Silberer, and Clemens Wolff.

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Conference Programme

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9:15–9:30 Introduction

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(Chair: Michael White)

9:30–10:00 *A Simple Surface Realization Engine for Telugu*
Sasi Raja Sekhar Dokkara, Suresh Verma Penumathsa and Somayajulu Gowri Sripada

10:00–10:30 *Input Seed Features for Guiding the Generation Process: A Statistical Approach for Spanish*
Cristina Barros and Elena Lloret

10:30–11:00 *Coffee*

Session 2: Sentence Planning and Evaluation

(Chair: Ehud Reiter)

11:00–11:30 *A Domain Agnostic Approach to Verbalizing n-ary Events without Parallel Corpora*
Bikash Gyawali, Claire Gardent and Christophe Cerisara

11:30–12:00 *Inducing Clause-Combining Rules: A Case Study with the SPaRKY Restaurant Corpus*
Michael White and David M. Howcroft

12:00–12:30 *Reading Times Predict the Quality of Generated Text Above and Beyond Human Ratings*
Sina Zarrieß, Sebastian Loth and David Schlangen

12:30–1:30 *Lunch*

1:30–2:30 **Invited Talk: Mirella Lapata**

(Chair: Matthew Purver)

Learning to Interpret and Describe Abstract Scenes

2:30–5:00 **Poster and Demo Session** (with coffee 3:00-3:30)

Posters

Moving Targets: Human References to Unstable Landmarks

Adriana Baltaretu, Emiel Kraemer and Alfons Maes

A Framework for the Generation of Computer System Diagnostics in Natural Language using Finite State Methods

Rachel Farrell, Gordon Pace and M Rosner

A Snapshot of NLG Evaluation Practices 2005 - 2014

Dimitra Gkatzia and Saad Mahamood

Japanese Word Reordering Executed Concurrently with Dependency Parsing and Its Evaluation

Tomohiro Ohno, Kazushi Yoshida, Yoshihide Kato and Shigeki Matsubara

Day 1: Thursday, 10th September 2015 (continued)

Sentence Ordering in Electronic Navigational Chart Companion Text Generation

Julie Sauvage-Vincent, Yannis Haralambous and John Puentes

Natural Language Generation from Pictographs

Leen Sevens, Vincent Vandeghinste, Ineke Schuurman and Frank Van Eynde

Translating Italian to LIS in the Rail Stations

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Response Generation in Dialogue Using a Tailored PCFG Parser

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JSrealB: A Bilingual Text Realizer for Web Programming

Paul Molins and Guy Lapalme

A Game-Based Setup for Data Collection and Task-Based Evaluation of Uncertain Information Presentation

Dimitra Gkatzia, Amanda Cercas Curry, Verena Rieser and Oliver Lemon

Generating Referential Descriptions Involving Relations by a Best-First Searching Procedure – A System Demo

Florin Haque and Helmut Horacek

5:00

End of Day 1

Day 2: Friday, 11th September 2015

9:00–10:00 **Invited Talk: Pinar Duygulu-Sahin**
Words and Pictures: Mining Weakly Labeled Web Images and Videos for Automatic Concept Learning

Session 3: Generation from Visual and Geographic Input (Chair: Amy Isard)

10:00–10:30 *Generating Image Descriptions with Gold Standard Visual Inputs: Motivation, Evaluation and Baselines*
Josiah Wang and Robert Gaizauskas

10:30–11:00 *Designing an Algorithm for Generating Named Spatial References*
Rodrigo de Oliveira, Yaji Sripada and Ehud Reiter

11:00–11:30 *Coffee*

Session 4: Narrative and Discourse (Chair: François Portet)

11:30–12:00 *Narrative Generation from Extracted Associations*
Pierre-Luc Vaudry and Guy Lapalme

12:00–12:30 *Topic Transition Strategies for an Information-Giving Agent*
Nadine Glas and Catherine Pelachaud

12:30–1:30 *Lunch*

Session 5: Data to Text (Chair: Claire Gardent)

1:30–2:00 *Creating Textual Driver Feedback from Telemetric Data*
Daniel Braun, Ehud Reiter and Advait Siddharthan

2:00–2:30 *A Personal Storytelling about Your Favorite Data*
Cyril Labbé, Claudia Roncancio and Damien Bras

2:30–3:00 **Closing Session**

3:00–3:30 *Coffee*

3:30–4:30 **Discussion Session on Generation Challenges Initiative**
(Chairs: Anya Belz, Albert Gatt)

4:30 *End of ENLG 2015*