## CLIN 28

 $Book \ of \ abstracts \ for \ the \\ 28th \ meeting \ of \ computational \ linguistics \ in \ the \ Netherlands$ 

Nijmegen,26 January 2018

automagically generated and typeset in LaTeX Book of abstracts of the 28th Meeting of Computational Linguistics in the Netherlands (CLIN 28). De Vereeniging, Nijmegen ©2018 github link

(5)2018 github link Book: louis onrust Cover: Erkan & louis

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### 1 Preface

Appear moveth saw air, beginning fruitful bearing fruitful waters is itself had great set. Can't moveth them subdue from. Good thing living. Was fourth, that.

Greater very place every said days every, a night all every upon. Every which had above fourth in female saying created over sea, isn't. God above multiply wherein form is, gathered whose creepeth. Deep face can't great wherein beginning wherein given had Night saying own under Seas green light appear days fifth seed. Itself signs together every form gathered waters Winged signs. Replenish moved stars i kind isn't dominion seasons heaven every. She'd moveth, without.

## 1.1 Committees

## 1.1.1 Organising Committee

### 1.1.2 Support

## 1.2 Past, Present, and Future CLIN meetings

| 4000 | 0 1 00       | OTTO III  |
|------|--------------|---|
| 1990 | October 26   | OTS Utrecht   |
| 1991 | November 29  | CWI Amsterdam   |
| 1992 | October 30   | ITK Tilburg   |
| 1993 | November 25  | Alfa-informatica Groningen                                  |
| 1994 | November 23  | TU Twente   |
| 1995 | December 1   | Antwerpen   |
| 1996 | November 15  | IPO Eindhoven   |
| 1997 | December 12  | Letteren KUN, Nijmegen                                      |
| 1998 | December 11  | CCL, KU Leuven  |
| 1999 | December 10  | OTS Utrecht   |
| 2000 | November 3   | Taal en Informatica, Tilburg                                |
| 2001 | November 30  | Computer Science, University of Twente                      |
| 2002 | November 29  | Alfa-informatica, University of Groningen                   |
| 2003 | December 19  | Centre for Dutch Language and Speech, University of Antwerp |
| 2004 | December 17  | Leiden Centre for Linguistics                               |
| 2005 | December 16  | University of Amsterdam                                     |
| 2007 | January 12   | CCL, KU Leuven  |
| 2007 | December 7   | Radboud University Nijmegen                                 |
| 2009 | January 22   | Groningen University  |
| 2010 | February 5   | UiL-OTS, Utrecht University                                 |
| 2011 | February 11  | LT3, University College Ghent                               |
| 2012 | January 20   | ILK, Tilburg University                                     |
| 2013 | January 18   | HMI, University of Twente, Enschede                         |
| 2014 | January 17   | INL & TST-Centrale, Leiden                                  |
| 2015 | February 5-6 | CLiPS, University of Antwerp                                |
| 2016 | December 18  | CLTL, VU Amsterdam  |
| 2017 | February 10  | CCL, KU Leuven  |
| 2018 | January 26   | CLS, Radboud University                                     |
|      | v            | •   |

#### 2.1 Gold

# /instituut voor de Nederlandse taal/

#### 2.2 Silver

## **LEGAL**INTELLIGENCE

Beter zoeken. Zeker weten.

## textkernel

Machine Intelligence for People and Jobs

#### 2.3 Bronze















| 8:30 - 9: | :30 | J |
|-----------|-----|---|
|-----------|-----|---|

#### Registration and Coffee

Centrale Hal

Session1 9:30 - 10:50

Emotion and Sentiment Kleine zaal Semi-supervised emotion lexicon expansion with label propagation Mario Giulianelli and Daniël de Kok

Using common sense detect irony on Twitter

Cynthia Van Hee, Els Lefever and Véronique Hoste

OMG het was **Z**000 lekker! Can grained sentiment coreference tion?

analysis benefit from resolu-Orphée De Clercq and

Veronique Hoste

Content Generation in fine-

Evnde

German and Dutch from Structured Data Andreas Madsack and Johanna Heininger

Language generation

cal simplification in

Bram Bulte, Leen Sevens

and Vincent Vandeghinste

Translation for Aug-

mented and Alterna-

Leen Sevens, Vincent Van-

deghinste, Lyan Verwimp, Ineke Schuurman, Patrick

Wambacq and Frank Van

tive Communication

Pictograph-to-Text

Leeuwzaal

Dutch

Automating

**Semantics** 

lexi-

Keizer Karel Fover

**Towards** Widecoverage Compositional Semantics for Dutch

Johan Bos, Lasha Abzianidze, Hessel Haagsma and Rik van Noord

From Topic Modeling to Concept Identification. The Added Value of Word Embeddings to Discern Semantic Coherence in Keyword Clusters

Mathias Coeckelbergs

IDEA: Idiom Detection - an Easy Approach

Anna Feldman, Jing Peng and Katsiaryna Aharodnik

IR and Knowledge Extraction

Sociëteitskamer Lawyers that Search? Thesaurus driven legal search using custom analysis and query parsing and beyond

Tierk de Greef and Pieter van Boxtel

User profiling with personal graphs Suzan Verberne

Methods For Automatically Generating a Legal Thesaurus and discussing NLP in the Legal Domain

Hugo de Vos

Shared Task and Discussion on Open data

Annazaal

TBA TBA

TBA**TBA** 

Open Data, Social Media and other User Generated Text: some topics for a discussion session

Ineke Schuurman, Leen Sevens, Vincent Vandeghinste

|               | Monitoring stance to-<br>wards vaccination in<br>Twitter messages<br>Florian Kunneman, Lies-<br>beth Mollema, Antal van<br>den Bosch, Mattijs Lam-<br>booij, Albert Wong and<br>Hester de Melker | Generating Topically Coherent Text with Recurrent Neural Networks Tim Van de Cruys  | Lexical Knowledge Acquisition with Theorem Proving Lasha Abzianidze   | Classifying Definitional Sentences using Multi-view Neural Network Architectures Subhradeep Kayal, Sameer Chivukula and Sophia Katrenko |
|---------------|--|---|---|---|
| 10:50 - 11:10 | Coffee Break<br>Centrale hal   |   |   |   |
| 11:15 - 11:25 | Welcome<br>Kleine zaal   |   |   |   |
| 11:25 - 11:35 | STIL Thesis Prize<br>Kleine zaal   |   |   |   |
| 11:35 - 12:40 | Andy Way (Invited speaker) Kleine zaal   |   |   |   |
| 12:40 - 13:30 | <b>Lunch</b><br>Keizer Karel Foyer   |   |   |   |
| 13:30 - 14:30 | Poster Session<br>Centrale Hal   |   |   |   |
| 14:30 - 15:30 | Deep Learning Kleine zaal Unsupervised dense patient representations with interpretable classification decisions Madhumita Sushil, Simon Suster, Kim Luyckx and Walter Daelemans                 | Language Variation Leeuwzaal Fine-grained genre/register recog- nition: romance fiction in the BNC Hans Van Halteren and Nelleke Oostdijk | Parsing and Grammar Sociëteitskamer Lexical Normalization for Neural Network Parsing Rob van der Goot and Gertjan Van Noord | NLP for historical text Annazaal Combining grammatical features for dating texts in small-corpus languages Camil Staps                  |

|               | SuperNMT: Integrating Supersense and Supertag Features into Neural Machine Translation Eva Vanmassenhove and Andy Way  | BasiScript: a 9 million word corpus of texts written in primary school Agnes Tellings, Nelleke Oostdijk, Iris Monster, Franc Grootjen and Antal van den Bosch  | Memory Based Modelling of Dutch Past<br>Tense Regularity<br>Christoph Aurnhammer  | Nederlab: Progress and challenges in lin- guistic enrichment of historical Dutch Texts Katrien Depuydt, Maarten Van Gom- pel, Hennie Brugman, Jesse de Does and Gosse Bouma |
|---------------|--|--|---|---|
|               | Towards multilingual sequence labelling using cross-lingual word embeddings Chao Li, Carsten van Weelden, Luigi Lorato, Carsten L. Hansen, Mihai Rotaru and Jakub Zavrel | Reducing perplexities<br>and word error rates<br>by improving the in-<br>terpolation factors of<br>a Bayesian skipgram<br>language model<br>Louis Onrust, Hugo Van<br>Hamme and Antal van<br>Den Bosch | TM-MT: the SCATE sliders Tom Vanallemeersch   | Good lynx, bad lynx: document enrichment for historical ecologists Marieke van Erp, Jesse De Does, Thomas van Goethem and Katrien Depuydt                                   |
| 15:30 - 15:55 | Coffee and beverages<br>Keizer Karel Foyer   |  |   |   |
| 15:55 - 17:15 | Social media and winner STIL Thesis Prize Kleine zaal  TBA Winner STIL Thesis Prize  | Authorship and Discourse Leeuwzaal  Patterns of rhetorical structure in student's writing in different text genres Rianne Conijn, Simon Knight, Roberto Martinez and Menno van Zaanen                  | Named Entity Recognition and Term Extraction Sociëteitskamer Improving named entity resolution for English to Chinese neural machine translation Camiel Colruyt | Translation Annazaal  Post-editing a Novel with Neural Machine Translation Antonio Toral  |

| Comparing and Integrating Machine Learning and Rule Based Microtext Classification Ali Hürriyetoğlu, Nelleke Oostdijk and Antal van Den Bosch | What can we learn<br>from behavioral bio-<br>metric data?<br>Barbara Plank  | Geo-temporal named<br>entity recognition in<br>multilingual picture<br>collections<br>Hans Paulussen and Dirk<br>De Hertog | 145 ways to insert punctuation for speech translation Vincent Vandeghinste, Lyan Verwimp, Joris Pelemans and Patrick Wambacq                                 |
|---|---|--|--|
| Transfer Learning on  | Microportrait detec-  | Global Space: A Re-  | Elastic-substitution   |
| Cyberbullying Classification Long Tran  | tion for identifying<br>stereotypes in Dutch<br>News<br>Antske Fokkens, Ruigrok<br>Nel, Sarah Gagenstein,<br>Wouter Van Atteveldt and<br>Beukeboom Camiel | constructive Model of<br>Word Reading<br>Stéphan Tulkens, Do-<br>miniek Sandra and Walter<br>Daelemans                     | decoding for Hierar-<br>chical SMT: efficiency,<br>richer search and<br>double labels<br>Gideon Maillette de Buy<br>Wenniger, Khalil Sima'An<br>and Andy Way |
| Relevant Information  | Discourse lexicons for  | Sequential Labelling   | To Wikify of to Ba-  |
| <b>Detection on Twitter</b><br>Ali Hürriyetoğlu, Nelleke  | multiple languages and<br>their use for gender  | with Active Learning to Extract Information  | belfy for Implicit Translation Evalua-   |
| Oostdijk, Antal van Den   | profiling   | about Disasters  | tion?  |
| Bosch and Mustafa Erkan   | Ben Verhoeven and Wal-  | M. Erkan Basar   | Iris Hendrickx, Maarten  |
| Basar   | ter Daelemans   |  | van Gompel and Antal<br>van Den Bosch  |
| Drinks  |   |  |  |
| Keizer Karel Foyer  |   |  |  |

17:15 - 18:15

#### 2.4 Keynote

#### 2.5 Oral presentations

145 ways to insert punctuation for speech translation

Vincent Vandeghinste, Lyan Verwimp, Joris Pelemans and Patrick Wambacq

Automating lexical simplification in Dutch

Bram Bulte, Leen Sevens and Vincent Vandeghinste

BasiScript: a 9 million word corpus of texts written in primary school

Agnes Tellings, Nelleke Oostdijk, Iris Monster, Franc Grootjen and Antal van den Bosch

Classifying Definitional Sentences using Multi-view Neural Network Architectures

Subhradeep Kayal, Sameer Chivukula and Sophia Katrenko

 $Combining\ grammatical\ features\ for\ dating\ texts\ in\ small-corpus\ languages$ 

Camil Staps

Comparing and Integrating Machine Learning and Rule Based Microtext Classification

Ali Hürriyetoğlu, Nelleke Oostdijk and Antal van Den Bosch

Content Generation in German and Dutch from Structured Data

Andreas Madsack and Johanna Heininger

Discourse lexicons for multiple languages and their use for gender profiling

Ben Verhoeven and Walter Daelemans

Elastic-substitution decoding for Hierarchical SMT: efficiency, richer search and double labels

Gideon Maillette de Buy Wenniger, Khalil Sima'An and Andy Way

Fine-grained genre/register recognition: romance fiction in the BNC

Hans Van Halteren and Nelleke Oostdijk

From Topic Modeling to Concept Identification. The Added Value of Word Embeddings to Discern

Semantic Coherence in Keyword Clusters

Mathias Coeckelbergs

Generating Topically Coherent Text with Recurrent Neural Networks

Tim Van de Cruvs

Geo-temporal named entity recognition in multilingual picture collections

Hans Paulussen and Dirk De Hertog

Global Space: A Reconstructive Model of Word Reading

Stéphan Tulkens, Dominiek Sandra and Walter Daelemans

Good lynx, bad lynx: document enrichment for historical ecologists

Marieke van Erp, Jesse De Does, Thomas van Goethem and Katrien Depuydt

IDEA: Idiom Detection - an Easy Approach

Anna Feldman, Jing Peng and Katsiaryna Aharodnik

Improving named entity resolution for English to Chinese neural machine translation

Camiel Colruyt

Lawyers that Search? Thesaurus driven legal search using custom analysis and query parsing and beyond

Tjerk de Greef and Pieter van Boxtel

Lexical Knowledge Acquisition with Theorem Proving

Lasha Abzianidze

Lexical Normalization for Neural Network Parsing

Rob van der Goot and Gertjan Van Noord

Memory Based Modelling of Dutch Past Tense Regularity

Christoph Aurnhammer

Methods For Automatically Generating a Legal Thesaurus and discussing NLP in the Legal Domain Hugo de Vos

Microportrait detection for identifying stereotypes in Dutch News

Antske Fokkens, Ruigrok Nel, Sarah Gagenstein, Wouter Van Atteveldt and Beukeboom Camiel

 $Monitoring\ stance\ towards\ vaccination\ in\ Twitter\ messages$ 

Florian Kunneman, Liesbeth Mollema, Antal van den Bosch, Mattijs Lambooij, Albert Wong and Hester de Melker

 $Nederlab:\ Progress\ and\ challenges\ in\ linguistic\ enrichment\ of\ historical\ Dutch\ Texts$ 

Katrien Depuydt, Maarten Van Gompel, Hennie Brugman, Jesse de Does and Gosse Bouma

OMG het was zooo lekker! Can fine-grained sentiment analysis benefit from coreference resolution? Orphée De Clercq and Veronique Hoste

Open Data, Social Media and other User Generated Text: some topics for a discussion session Ineke Schuurman, Leen Sevens, Vincent Vandeghinste

Patterns of rhetorical structure in student's writing in different text genres

Rianne Conijn, Simon Knight, Roberto Martinez and Menno van Zaanen

Pictograph-to-Text Translation for Augmented and Alternative Communication

Leen Sevens, Vincent Vandeghinste, Lyan Verwimp, Ineke Schuurman, Patrick Wambacq and Frank Van Eynde

Post-editing a Novel with Neural Machine Translation

Antonio Toral

Reducing perplexities and word error rates by improving the interpolation factors of a Bayesian skipgram language model

Louis Onrust, Hugo Van Hamme and Antal van Den Bosch

Relevant Information Detection on Twitter

Ali Hürriyetoğlu, Nelleke Oostdijk, Antal van Den Bosch and Mustafa Erkan Basar

Semi-supervised emotion lexicon expansion with label propagation

Mario Giulianelli and Daniël de Kok

Sequential Labelling with Active Learning to Extract Information about Disasters

M. Erkan Basar

 $SuperNMT:\ Integrating\ Supersense\ and\ Supertag\ Features\ into\ Neural\ Machine\ Translation$ 

Eva Vanmassenhove and Andy Way

TM-MT: the SCATE sliders

Tom Vanallemeersch

To Wikify of to Babelfy for Implicit Translation Evaluation?

Iris Hendrickx, Maarten van Gompel and Antal van Den Bosch

Towards Wide-coverage Compositional Semantics for Dutch

Johan Bos, Lasha Abzianidze, Hessel Haagsma and Rik van Noord

Towards multilingual sequence labelling using cross-lingual word embeddings

Chao Li, Carsten van Weelden, Luigi Lorato, Carsten L. Hansen, Mihai Rotaru and Jakub Zavrel

Transfer Learning on Cyberbullying Classification

Long Tran

Unsupervised dense patient representations with interpretable classification decisions

Madhumita Sushil, Simon Suster, Kim Luyckx and Walter Daelemans

User profiling with personal graphs

Suzan Verberne

Using common sense to detect irony on Twitter

Cynthia Van Hee, Els Lefever and Véronique Hoste

What can we learn from behavioral biometric data?

Barbara Plank

#### 2.6 Posters

A Lexicon of Dutch Connectives

Peter Bourgonje, Jacqueline Evers-Vermeul, Jet Hoek, Gisela Redeker, Ted Sanders and Manfred Stede

A connectionist model of serial order applied to speaking rate control

Joe Rodd, Hans Rutger Bosker, Mirjam Ernestus and Louis Ten Bosch

 $A\ filter\ for\ syntactically\ comparable\ parallel\ sentences$ 

Martin Kroon and Sjef Barbiers

An NLP workflow for replicability

Minh Le

A practical linguistic annotation infrastucture: FoLiA, its tools, and FLAT

Maarten Van Gompel

Attribute Obfuscation with Gradient Reversal

Chris Emmery, Enrique Manjavacas and Grzegorz Chrupała

Authorship Attribution on the Dark Web

Maya Sappelli and Stephan Raaijmakers

Automated detection of offensive language on social media

Finn Rübsaam, Roser Morante and Fleur van der Houwen

Automatic Detection and Correction of dt-mistakes Using Recurrent Neural Networks

Yannick Laevaert, Geert Heyman and Marie-Francine Moens

Automatically grading students' answers to exam questions

Johanna de Vos

Automatic image description for Dutch

Emiel van Miltenburg

Automating Coherence Analysis for the Computationally Challenged

Erwin R. Komen and Jet Hoek

Children are more likely to store coherent rather than frequent under-segmented chunks: Quantitative evidence from a corpus study

Robert Grimm, Steven Gillis and Walter Daelemans

Classifying Abnormalities in Mammography Reports in Dutch

Tim Loyen and Roser Morante

Clinical Machine Comprehension with Case Reports

Simon Suster and Walter Daelemans

Comparing MT errors in NMT, SMT and RBMT output for English-Dutch

Laura Van Brussel, Arda Tezcan and Lieve Macken

Computational linguistic opportunities at the Koninklijke Bibliotheek

Martijn Kleppe, Lotte Wilms and Steven Claeyssens

Connecting NLP pipelines: An experiment in interoperability

Antske Fokkens and Maarten Van Gompel

Content and Annotation Compatibility Across Corpora: The Case of Events

Chantal van Son, Lora Aroyo, Oana Inel, Roser Morante and Piek Vossen

Deer Reeder First may I say, sorry for any werds I spel rong. On Open Data and User Generated Text

Ineke Schuurman, Leen Sevens and Vincent Vandeghinste

Dialect mapped: knowledge rich or knowledge poor?

Hans van Halteren, Roeland van Hout and Romy Roumans

Evaluation of Different Dialogue Corpora for Training a Chatbot

Elizaveta Kuzmenko

Exploring automated template generation for data-to-text systems

Chris van der Lee, Emiel Krahmer and Sander Wubben

From distant to close reading: evaluating the use of LDA topic modeling

Christoph Aurnhammer, Iris Cuppen, Inge van de Ven and Menno van Zaanen

Gold Standard for Multilingual Automatic Term Extraction from Comparable Corpora

Ayla Rigouts Terryn, Veronique Hoste and Els Lefever

Improving Sense Disambiguation of Potentially Idiomatic Expressions

 ${\it Hessel~Haagsma}$ 

Language change in the Corpus Gesproken Nederlands: An apparent-time study of verb cluster order Marieke Olthof, Maud Westendorp and Jelke Bloem

 $Lexical\ preferences\ in\ the\ Perfect\ construction$ 

Martijn van der Klis

Modeling relations in a referential game

Lieke Gelderloos, Afra Alishahi, Grzegorz Chrupała and Raquel Fernández

Named Entity Recognition in Dutch Archaeological Research Reports

Alex Brandsen, Suzan Verberne and Milco Wansleeben

 $Ochre,\ a\ Toolbox\ for\ OCR\ Post-Correction$ 

Janneke Van Der Zwaan and Lotte Wilms

Predicting the asking price of real estate offers

Hendrik Prins and Malvina Nissim

Reddit as a Corpus for Data-Driven Dialogue Modelling

Bram Willemsen

Semi-Automated Anonymization of Dutch Court Cases

Simon Brugman and Arjen P. de Vries

Sentiment Analysis: Skipping Mumbo Jumbo and Revealing How We Actually Do It!!

Md Ataur Rahman and Rudra Pratap Deb Nath

Spelling variation in Dutch tweets

Hans Van Halteren and Nelleke Oostdijk

Stylometric Text Analysis for Adolescents with Autism Spectrum Disorder

Luna De Bruyne and Walter Daelemans

Syntactic properties of skip-thought vectors

Bart Broere

TICCLAT: Text-Induced Corpus Correction and Lexical Assessment Tool

Martin Reynaert

The Circumstantial Event Ontology (CEO): A New Resource for Tracking Event Chains based on Implicit Semantic Relations.

Roxane Segers, Piek Vossen and Tommaso Caselli

The Claus Case: Exploring the Use of Propositional Idea Density for Alzheimer Detection Silke Marckx, Ben Verhoeven and Walter Daelemans

Towards an automatic identification of tone of voice in online conversations Christine Liebrecht and Charlotte Van Hooijdonk

Using Location and Dialect to Classify Twitter Users from the Netherlands and Flanders Ali Hürriyetoğlu and Piet Daas