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# Johannes Bjerva

## Personal Information

Full name: Johannes Bjerva  
Birth: 21 March 1990, Oslo, Norway  
Nationalities: Norwegian and Finnish  
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## Education

2013 – 2017 **Ph.D. Computational Semantics**  
(08/2017 expected) *Center for Language and Cognition Groningen, University of Groningen*  
Thesis: ‘Lexical Processing with Deep Neural Networks: Multitask Learning and Multilingual Approaches’  
Supervisors: Prof. Johan Bos and Dr. Barbara Plank

2012 – 2013 **M.A. Computational Linguistics**  
*Department of Linguistics, Stockholm University, Sweden*

2009 – 2012 **B.A. Computational Linguistics**  
*Department of Linguistics, Stockholm University, Sweden*

2008 – 2009 **Japanese language and culture**  
*Stockholm University, Sweden*  
*Ritsumeikan University, Kyoto, Japan (summer school)*

### Miscellaneous

2017 **DeepLearn-2017**, Bilbao, Spain

2016 **European Summer School in Logic Language and Information (ESSLLI)**, Bolzano, Italy

2015 **Lisbon Machine Learning School (LxMLS)**, Instituto Superior Técnico  
**Workshop Big Data**, University of Groningen  
**Workshop Numerical Python**, University of Groningen

## Professional Experience

2012 – 2013 **Software developer**  
*Slagkryssaren Ltd., Stockholm, Sweden*

2011 – 2012 **Research assistant**  
*Department of Linguistics, Stockholm University, Sweden*

2010 – 2011 **Phonetic transcriber (Norwegian)**  
*Acapela Group, Stockholm, Sweden*

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## Publications

### Journal papers and book chapters

- Bjerva, J. (invited, in review). Quantifying the Effects of Multilinguality in NLP Sequence Prediction Tasks. *Northern European Journal of Language Technology (NEJLT)*, n, x–y.
- Bos, J., Basile, V., Evang, K., Venhuizen, N. J. & Bjerva, J. (2017). The Groningen Meaning Bank. In N. Ide & J. Pustejovsky (Eds.), *Handbook of Linguistic Annotation* (pp. 463–496). Dordrecht: Springer Netherlands. doi:10.1007/978-94-024-0881-2\_18

### Proceedings (peer-reviewed)

- Bjerva, J., Grigonytė, G., Östling, R. & Plank, B. (submitted). Neural Networks and Spell Checking for Native Language Identification.
- Östling, R. & Bjerva, J. (2017). SU-RUG at the CoNLL-SIGMORPHON 2017 shared task: Morphological Inflection with Attentional Sequence-to-Sequence Models. In *Proceedings of the 2017 Meeting of SIGMORPHON*. Vancouver, Canada: Association for Computational Linguistics.
- Bjerva, J. (2017). Will my auxiliary tagging task help? Estimating Auxiliary Tasks Effectivity in Multi-Task Learning. In *Proceedings of the 21st Nordic Conference on Computational Linguistics, NoDaLiDa, 22-24 May 2017, Gothenburg, Sweden* (131, pp. 216–220). Linköping University Electronic Press, Linköpings universitet. **Best short paper!**
- Bjerva, J. & Östling, R. (2017a). Cross-lingual Learning of Semantic Textual Similarity with Multilingual Word Representations. In *Proceedings of the 21st Nordic Conference on Computational Linguistics, NoDaLiDa, 22-24 May 2017, Gothenburg, Sweden* (131, pp. 211–215). Linköping University Electronic Press, Linköpings universitet.
- Bjerva, J. & Östling, R. (2017b). Multilingual Word Representations for Semantic Textual Similarity. In *Proceedings of SemEval 2017: International Workshop on Semantic Evaluation*. Vancouver, Canada.
- Abzianidze, L., Bjerva, J., Evang, K., Haagsma, H., van Noord, R., Ludmann, P., ... Bos, J. (2017). The Parallel Meaning Bank: Towards a Multilingual Corpus of Translations Annotated with Compositional Meaning Representations. In *Proceedings of the 15th Conference of the European Chapter of the Association for Computational Linguistics: Volume 2, Short Papers* (pp. 242–247). Valencia, Spain: Association for Computational Linguistics. Retrieved from <http://aclweb.org/anthology/E17-2039>
- Bjerva, J., Plank, B. & Bos, J. (2016). Semantic Tagging with Deep Residual Networks. In *Proceedings of COLING 2016, the 26th International Conference on Computational Linguistics: Technical Papers* (pp. 3531–3541). Osaka, Japan: The COLING 2016 Organizing Committee. Retrieved from <http://aclweb.org/anthology/C16-1333>
- Bjerva, J. & Börstell, C. (2016). Morphological Complexity Influences Verb-Object Order in Swedish Sign Language. In *Proceedings of the Workshop on Computational Linguistics for Linguistic Complexity (CL4LC)* (pp. 137–141). Osaka, Japan: The COLING 2016 Organizing Committee. Retrieved from <http://aclweb.org/anthology/W16-4116>

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- Bjerva, J. (2016). Byte-based Language Identification with Deep Convolutional Networks. In *Proceedings of the Third Workshop on NLP for Similar Languages, Varieties and Dialects (VarDial3)* (pp. 119–125). Osaka, Japan: The COLING 2016 Organizing Committee. Retrieved from <http://aclweb.org/anthology/W16-4816>
- Bjerva, J., Bos, J. & Haagsma, H. (2016). The Meaning Factory at SemEval-2016 Task 8: Producing AMRs with Boxer. In *Proceedings of the 10th International Workshop on Semantic Evaluation (SemEval-2016)* (pp. 1179–1184). San Diego, California: Association for Computational Linguistics. doi:10.18653/v1/S16-1182
- Haagsma, H. & Bjerva, J. (2016). Detecting novel metaphor using selectional preference information. In *Proceedings of the Fourth Workshop on Metaphor in NLP* (pp. 10–17). San Diego, California: Association for Computational Linguistics. doi:10.18653/v1/W16-1102
- Busger op Vollenbroek, M., Carlotto, T., Kreutz, T., Medvedeva, M., Pool, C., Bjerva, J., ... Nissim, M. (2016). GronUP: Groningen User Profiling. In *Proceedings of CLEF 2016*.
- Bjerva, J. & Praet, R. (2015). Word Embeddings Pointing the Way for Late Antiquity. In *9th SIGHUM Workshop on Language Technology for Cultural Heritage, Social Sciences and Humanities (LaTeCH 2015)* (pp. 53–57). Association for Computational Linguistics.
- Bjerva, J. (2014). Multi-class Animacy Classification with Semantic Features. In *Proceedings of the Student Research Workshop at the 14th Conference of the European Chapter of the Association for Computational Linguistics* (pp. 65–75). Gothenburg, Sweden: Association for Computational Linguistics. doi:10.3115/v1/E14-3008
- Bjerva, J., Bos, J., Van der Goot, R. & Nissim, M. (2014). The Meaning Factory: Formal Semantics for Recognizing Textual Entailment and Determining Semantic Similarity. In *Proceedings of the 8th International Workshop on Semantic Evaluation (SemEval 2014)* (pp. 642–646). Dublin, Ireland.

## Reviewing

2017	EMNLP 2017 (Copenhagen, Denmark), CoNLL 2017 (Vancouver, Canada), ACL 2017 (Vancouver, Canada), IJCNLP 2017 (Taipei, Taiwan), SemEval 2017 Task 1 (Vancouver, Canada), VarDial 2017 (Valencia, Spain), NoDaLiDa 2017 (Gothenburg, Sweden)
2016	EACL 2017 (Valencia, Spain), COLING 2016 (Osaka, Japan), VarDial 2016 (Osaka, Japan), SemEval-2016 Task 8 (San Diego, California)
2014	The Handbook of Linguistic Annotation (Springer), SemEval-2014 Task 1 (Dublin, Ireland), 35th TABU Dag Conference (Groningen, Netherlands).

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## Teaching

Summer 2016	Learning from Data: A Foundational Course for Linguistics ( <i>ML course</i> ) With Dr. Malvina Nissim 30 students, taught at ESSLLI, Bolzano, Italy.
Spring 2016	Digital Humanities: Hands on Data ( <i>LHU002P05</i> ) With Dr. Malvina Nissim and Raf Praet Lecture and lab on Digital Humanities in Late Antiquity Bachelor level, 21 students
Autumn 2015	Machine Learning ( <i>LIX016M05 – Learning from Data</i> ) With Dr. Malvina Nissim and Hessel Haagsma Lecture and lab on Artificial Neural Networks and Deep Learning Master level, 12 students
Spring 2015	Python programming ( <i>LIX016P05 – Advanced programming</i> ) With Prof. Dr. Gertjan van Noord and Dr. Leonie Bosveld-de Smet Bachelor level, 50 students, taught in Dutch, main course responsibility
Spring 2014	Python programming ( <i>LIX016P05 – Advanced programming</i> ) With Kilian Evang and Dr. Leonie Bosveld-de Smet Bachelor level, 45 students

## Miscellaneous

### In the media

‘University of Groningen to start Master’s degree programme in Digital Humanities’,

University of Groningen Unifocus film (17-02-2016) <https://youtu.be/7AhbJljFpRI>

‘De oudheid... digitaal!’ (*Ancient history... digitally!*) University newspaper article (06-10-2015)

<http://www.ukrant.nl/wetenschap-onderwijs/de-oudheid-digitaal.html> (in Dutch)

### Natural languages

English (C2), Norwegian (Native), Swedish (~C1), Dutch (~C1), Finnish (~A2), Japanese (~A2), Swedish Sign Language (~A1).

### Certificates

Cambridge Certificate of Proficiency in English (CPE, C2 level, Grade A)

### Other relevant competencies

numpy, scipy, make, keras, git, svn, latex, unix, osx

Last updated: 4th July 2017