

MELANIE TOSIK

New York, NY

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melanietosik.com

EDUCATION

New York University, New York, NY expected 05/2019
M.S., Computer Science

University of Potsdam, Potsdam, Germany 10/2011 – 09/2015
B.S., Computational Linguistics

PROFESSIONAL EXPERIENCE

Data Science Intern 06/2018 – 08/2018
BuzzFeed
Developed a machine learning tool to provide content recommendations for natural language inputs

Data Science Consultant 07/2017 – 12/2017
Underdog.io
Automated internal processes for resume parsing and candidate-company matching

Research Engineer – NLP 10/2015 – 06/2017
WayBlazer
Designed a dialogue system around natural language understanding and ontology extraction

Research Intern 06/2014 – 08/2014
Textkernel
Improved multilingual resume parsing by integrating word embeddings into a sequence labeling model

Undergraduate Research Assistant 07/2013 – 04/2014
Applied Computational Linguistics Discourse Research Lab
University of Potsdam
Co-developed a Python tool for automatic coreference resolution

PUBLICATIONS

Vishwali Mhasawade, Ildikó E. Szabó, Melanie Tosik, and Sheng-Fu Wang. 2018. [Neural Networks and Quantifier Conservativity: Does Data Distribution Affect Learnability?](#). *CoRR*, abs/1809.05733.

Melanie Tosik, Antonio Mallia, and Kedar Gangopadhyay. 2018. [Debunking Fake News One Feature at a Time](#). *CoRR*, abs/1808.02831.

Melanie Tosik, Carsten L. Hansen, Gerard Goossen, and Mihai Rotaru. 2015. [Word Embeddings vs Word Types for Sequence Labeling: the Curious Case of CV Parsing](#). *Proceedings of NAACL-HLT 2015*, pages 123-128, Denver, Colorado, May 31 – June 5, 2015.

SKILLS AND INTERESTS

- Proficient in Python, C, C++, Java, R, Git, AWS, Elasticsearch, and related technologies
- Experienced with common NLP/ML toolkits and frameworks, including spaCy, SciPy, NumPy, Pandas, CoreNLP, PyTorch, Tensorflow, Jupyter, IBM Bluemix, etc.
- Familiar with ML algorithms for clustering, classification, sequence labeling, and deep learning
- Versed in knowledge base construction and entity linking using RDF, SPARQL, and DBpedia

POSTERS AND PRESENTATIONS

Melanie Tosik. "Practical Question Answering." *General Assembly*, Austin, 2018.

Melanie Tosik. "Generating personalized travel recommendations from natural language queries." *Data Day Seattle*, Seattle, 2016.

TEACHING EXPERIENCE

Graduate Teaching Assistant Spring 2018/2019

"Big Data Science"

Instructor: Dr. Anasse Bari

Courant Institute of Mathematical Sciences, New York University

Covers a variety of analytics algorithms and applications (dimensionality reduction, feature selection and extraction, similarity measures, decision trees, clustering, classification, recommender systems), as well as an introduction to large-scale file systems and MapReduce (Hadoop, Apache Mahout, Apache Spark)

Graduate Teaching Assistant Fall 2018

"Predictive Analytics"

Instructor: Dr. Anasse Bari

Courant Institute of Mathematical Sciences, New York University

Introduces the basics of the data analytics lifecycle and a variety of tools and techniques to analyze data, with applications ranging from bioinformatics to social network analysis and text mining

Teaching Assistant Fall 2014

"Techniques in Computational Linguistics"

Instructor: Prof. Dr. Alexander Koller

Department of Linguistics, University of Potsdam

Studies grammar parsing algorithms and statistical methods (n-gram analysis, hidden Markov models)

LANGUAGES

German

Native

English

Fluent

French

Working knowledge