# **Curriculum vitae**

### **Personal information**

Name and surname: Iryna Korshunova E-mail: irene.korshunova@gmail.com Current location: Ghent, Belgium Date of birth: 27 April, 1991

LinkedIn: https://www.linkedin.com/in/IraKorshunova

Github: https://github.com/IraKorshunova

Kaggle: http://www.kaggle.com/users/190873/golondrina

### **Education**

#### M.S. in Statistical Data Analysis

Courses: Analysis of Continuous Data, Categorical Data Analysis, Computerintensive Statistical Methods,

Data Mining, Multivariate Data Analysis, Principles of Statistical Data Analysis, Statistical Computing,

Statistical Inference

Ghent University, Belgium

Sept. 2013 –

Sept. 2015

#### M.S. in Applied Mathematics

Faculty of applied mathematics,

National Technical University of Ukraine "Kiev Polytechnic Institute"

Main courses: Numerical Methods of Mathematical Physics, Programming Language Compilers, Software

Design, Soft Computing

Sept. 2012 –

June 2015

#### B.S. in Applied Mathematics

Faculty of applied mathematics,

National Technical University of Ukraine "Kiev Polytechnic Institute"

2008 - 2012,

Diploma with

honours

# **Projects and research**

#### **Python+Theano** (2014-2015):

- National Data Science Bowl (≈ Deep Sea ≈ team 1<sup>st</sup>/1049, Kaggle) [blog post]
- American Epilepsy Society Seizure Prediction Challenge (10th/504, Kaggle) [code]
- DecMeg2014 Decoding the Human Brain (19<sup>th</sup>/ 267, Kaggle)
- <u>UPenn and Mayo Clinic's Seizure Detection Challenge</u> (56<sup>th</sup>/200, Kaggle)[code]

#### C++ (2013):

• Numerically stable implementation of Viterbi and Forward-Backward algorithms in context of Hidden Markov Models [code]

#### Java (2010-2012):

- <u>Classification of psychiatric problems based on saccades</u> (2<sup>nd</sup> award in IJCNN 2012 Competition: International Joint Conference on Neural Networks, Brisbane, Australia)
- Classifier of the bone shapes for arthritis diagnostics with free-knot splines
- Illustrative 3D visualization software for differential evolution
- Application for melody generation and its harmonization

## **Work Experience**

#### Research Engineer Intern

Grammarly, Inc., Kiev, Ukraine

- 1. implemented an algorithm for topic model evaluation,
- 2. developed a method for combining different models used in contextual spell checker

Summer 2013

- 3. changed an evaluation mechanism of the contextual spell checker
- 4. compared the performance of several named-entity recognizers
- 5. created a multipurpose corpus, based on Wikipedia
- 6. started a research on word representations and neural network language models

### **Publications**

- Korshunova I. Free knot splines for functional data classification // SAIT 2012: International Conference
  on System Analysis and Information Technologies, Kyiv, Ukraine
- *Korshunova I*. Classification of functional data with free knots splines // System Research and Information Technologies. 2014. № 2. P. 115–124. [abstract]

# **Skills and competences**

#### Languages

- English fluent
- Dutch beginner
- Ukrainian, Russian native

#### **Computer skills**

- Programming languages: Python (+Theano), R, Java SE
- Toolkits: Weka, Mallet, Apache OpenNLP

#### **Other**

- Playing cello (currently at Ghent University Symphony Orchestra)
- Hiking