

# Iryna Korshunova

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<b>Location</b>	Ghent, Belgium & London, UK	<b>Website</b>	<a href="https://irakorshunova.github.io">irakorshunova.github.io</a>
<b>Email</b>	<a href="mailto:irene.korshunova@gmail.com">irene.korshunova@gmail.com</a>	<b>Github</b>	<a href="https://github.com/IraKorshunova">github.com/IraKorshunova</a>
		<b>Kaggle</b>	<a href="https://kaggle.com/golondrina">kaggle.com/golondrina</a>

## Education

<b>2018-</b>	<b>Visiting PhD student</b> - Gatsby Computational Neuroscience Unit, UCL, London, UK Supervisor: Arthur Gretton
<b>2015-</b>	<b>PhD student in Machine Learning</b> - Reservoir Lab, Ghent University, Belgium
<b>2013-2015</b>	MSc in Statistical Data Analysis - Ghent University, Belgium <i>Magna cum laude</i>
<b>2012-2015</b>	MSc in Applied Mathematics - National Technical University of Ukraine “Kiev Polytechnic Institute” <i>Diploma with honours</i>
<b>2008-2012</b>	BSc in Applied Mathematics - National Technical University of Ukraine “Kiev Polytechnic Institute” <i>Diploma with honours</i>

## Extra Courses

<b>July, 2015</b>	Machine Learning Summer School Max Planck Institute for Intelligent Systems, Tübingen, Germany (received a travel stipend)
<b>August, 2015</b>	Deep Learning Summer School Université de Montréal, Montreal, Canada

## Research Assistantships

<b>Summer, 2017</b>	Twitter London, UK <i>Research Intern</i> Supervisor: Lucas Theis Pruned neural networks, contributed to PyTorch, played foosball
<b>Summer, 2016</b>	Twitter / Magic Pony Technology, London, UK <i>Research Intern</i> Supervisors: Lucas Theis and Ferenc Huszár Developed a real-time face swapping method based on neural style transfer
<b>Summer, 2013</b>	Grammarly Inc., Kiev, Ukraine <i>Research Engineer Intern</i> Worked on the evaluation of topic models and their integration into a contextual spell checker; created a multipurpose Wikipedia-based corpus

## Honours and Awards

<b>2017</b>	Data Science Bowl 2017 (Kaggle) <i>9th place, \$25K prize, team Deep Breath</i> Lung cancer prediction from chest CT scans
<b>2016</b>	Second Annual Data Science Bowl (Kaggle) <i>2th place, \$50K prize, team kunsthart</i> Cardiac volumes estimation based on 4D MRI-data of a heart

- 2015** National Data Science Bowl (Kaggle)  
*1st place, \$100K prize, team Deep Sea*  
 Classification of plankton images
- 2014** American Epilepsy Society Seizure Prediction Challenge (Kaggle)  
*10th place, top 2%*  
 Epileptic seizure prediction based on iEEG signals

## Publications

**Iryna Korshunova**, Jonas Degraeve, Ferenc Huszár, Yarin Gal, Arthur Gretton, Joni Dambre. A generative deep recurrent model for exchangeable data. *Preprint arXiv:1802.07535*, 2018.

Lucas Theis, **Iryna Korshunova**, Alykhan Tejani, Ferenc Huszár. Faster gaze prediction with dense networks and Fisher pruning. *Preprint arXiv:1801.05787*, 2018.

**Iryna Korshunova**, Wenzhe Shi, Joni Dambre, Lucas Theis. Fast face-swap using convolutional neural networks. *IEEE International Conference on Computer Vision (ICCV)*, 2017; [arXiv:1611.09577](#)

**Iryna Korshunova**, Pieter-Jan Kindermans, Jonas Degraeve, Thibault Verhoeven, Benjamin Brinkmann, Joni Dambre. Towards improved design and evaluation of epileptic seizure predictors. *IEEE Transactions on Biomedical Engineering*, 2017; DOI: [10.1109/TBME.2017.2700086](#)

Benjamin H. Brinkmann, Joost Wagenaar, **Iryna Korshunova** et al. Crowdsourcing reproducible seizure forecasting in human and canine epilepsy. *Brain Jun 2016*, 139 (6) 1713-1722; DOI: [10.1093/brain/aww045](#)

Bob L. Sturm, João F. Santos, Oded Ben-Tal, **Iryna Korshunova**. Music transcription modelling and composition using deep learning. *1st Conference on Computer Simulation of Musical Creativity, June 2016*; [arXiv:1604.08723](#) [code]

Bob L. Sturm, João F. Santos, and **Iryna Korshunova**. Folk music style modelling by recurrent neural networks with long short term memory units. *International Society for Music Information Retrieval (ISMIR) conference, October 2015. (late-breaking demo)* [pdf, code]

**Iryna Korshunova** Epileptic seizure prediction using deep learning. *Master dissertation*, 2015 [pdf]

**Iryna Korshunova** Classification of functional data with free knots splines. *System Research and Information Technologies 2014*, 115–124; [abstract]

## Other

### Languages

Ukrainian, Russian - native  
 English - full professional proficiency  
 Dutch - elementary proficiency

### Personal interests

Playing cello (previously at Ghent University Symphony Orchestra)