

# Dmitry Grishchenko

LJK, Bâtiment IMAG, Off. 132, 700 Avenue Centrale  
38401, Saint-Martin-d'Hères, France

✉ dmitry.grishchenko@univ-grenoble-alpes.fr • 🌐 grishchenko.org

*I have not failed. I've just found 10,000 ways that won't work.*

*Thomas A. Edison*

## Education

### Université Grenoble Alpes

*Ph.D. in Applied Mathematics*

**Subject:** Distributed Optimization for Large-Scale Problems

**Supervisors:** F. lutzeler (UGA), M.-R. Amini (UGA), J. Malick (CNRS and LJK).

**Grenoble**

2017–now

### Higher School of Economics

*M.Sc. in Applied Mathematics*

**Thesis:** Minimal Mutual Information Model Problem

**Supervisor:** A. Gasnikov (MIPT).

**Moscow**

2015–2017

### Higher School of Economics

*M.Sc. in Mathematics*

**Thesis:** Lattices, Sphere Packing and Number Theory

**Supervisor:** A. Zykin (HSE).

**Moscow**

2011–2015

## Summer Schools and Research Visits

### KAUST

*Research Visit; Adviser: P. Richtarik*

**Thuwal**

2019

### ICCOPT 2019

*Summer School*

**Berlin**

2019

### mini-cours "optimisation et apprentissage: applications en vision"

*Summer School*

**Autrans**

2018

### KAUST

*Research Visit; Adviser: P. Richtarik*

**Thuwal**

2017

## Scholarships and Grants

### PGMO - PRMO

*Distributed Optimization on Graphs with Flexible Communications, 5k euro*

Together with F. lutzeler (LJK, Grenoble)

2019–2020

## Experience

---

### Vocational.....

#### Université Grenoble Alpes

**Grenoble**

*Teaching assistant*

*2018–now*

- 2019–2020
  - Matrix Analysis and Numerical Optimization (20h)
- 2018–2019
  - Matrix Analysis and Numerical Optimization (20h)
  - Convex and Distributed Optimization (20h)
  - Optimisation Numérique (20h)

#### Altium

**Moscow**

*Software Developer*

*2016–2017*

*PCB design software*

Writing the topological tracer library on C++. Establishing and maintaining geometric library. Working with Boost C++ library, unit-tests.

#### The Tournament of Towns

**Moscow**

*Mathematical Olympiad Works Inspector*

*2011–2015*

*Check the correctness of the solutions*

Reading and assessing the works of the high school students.

### Miscellaneous.....

#### Citibank

**Moscow**

*Intern in Decision Management Unit*

*2014–2015*

*Help in creating new products passports*

Maintaining an online passports creator via MS Sharepoint and SQL.

## Languages

---

**Russian:** Native

**Python:** numpy, spark, mpi4py, scipy,...

**English:** Fluent

**C++:** STL, Boost

**French:** Basic

knowledge of: **Julia**, **LaTeX**, **Markdown**

## Certificates

---

#### Algorithmic Toolbox

**Coursera**

*2016*

*An online non-credit course authorized by University of California, San Diego and Higher School of Economics and offered through Coursera.*

## Presentations

---

### Conferences and Workshops.....

#### ICCOPT 2019

**Berlin**

*Talk*

*2019*

Identification-Based First-Order Algorithms for Distributed Learning

#### SPARS 2019

**Toulouse**

*Poster*

*2019*

Distributed First-Order Optimization with Tamed Communications

<b>OSL 2019</b> <i>Poster</i> Identify and Sparsify: Distributed Optimization with Asynchronous Moderate Communications	<b>Les Houches</b> 2019
<b>ISMP 2018</b> <i>Talk</i> Distributed Optimization with Sparse Communications and Structure Identification	<b>Bordeaux</b> 2018
<b>Grenoble Optimization Days 2018</b> <i>Talk</i> Distributed Optimization with Sparse Communications and Structure Identification	<b>Grenoble</b> 2018
<b>Journées SMAI-MODE 2018</b> <i>Poster</i> Distributed Optimization with Sparse Communications	<b>Autrans</b> 2018
<b>59<sup>th</sup> MIPT scientific conference</b> <i>Talk</i> Solving of Minimal Mutual Information Model Problem via Regularization of Dual Problem and Using Ellipsoid Method with Inexact Oracle	<b>Moscow</b> 2016
<b>Other.....</b>	
<b>Grenoble Optimization Reading Group</b> <i>Talk</i> Accelerated Distributed Optimization with Asynchronous Moderate Communications	<b>Grenoble</b> 2019
<b>DAO team seminar</b> <i>Talk</i> Identify and Sparsify: Distributed Optimization with Asynchronous Moderate Communications	<b>Grenoble</b> 2019
<b>Demi-journée des doctorants 2018</b> <i>Talk</i> Randomized Proximal Algorithm with Automatic Dimension Reduction	<b>Grenoble</b> 2018

## Papers

<b>D. Grishchenko</b> , F. Iutzeler, and J. Malick <i>Proximal Gradient Methods with Adaptive Subspace Sampling</i> Under review in MOOR	<b>Preprint</b> 2019
A. Ivanova, <b>D. Grishchenko</b> , A. Gasnikov, E. Shulgin <i>Adaptive Catalyst for smooth convex optimization</i>	<b>Preprint</b> 2019
<b>D. Grishchenko</b> , F. Iutzeler, J. Malick, and M.-R. Amini <i>Asynchronous Distributed Learning with Sparse Communications and Identification</i>	<b>Preprint</b> 2018
F. Hanzley, J. Konecny, N. Loizou, P. Richtarik, <b>D. Grishchenko</b> <i>A Privacy Preserving Randomized Gossip Algorithm via Controlled Noise Insertion</i>	<b>Workshop</b> 2018
<b>PPML NeurIPS 2018</b> F. Hanzley, J. Konecny, N. Loizou, P. Richtarik, <b>D. Grishchenko</b> <i>Privacy preserving randomized gossip algorithms.</i>	<b>Preprint</b> 2017
<b>D. Grishchenko</b> <i>Origami: What One Can Get via Paper Folding (Rus)</i>	<b>Journal</b> 2013
<b>Matematicheskoye Prosveshcheniye</b>	