

# Mufan (Bill) Li

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## DEGREES

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### University of Toronto

Ph.D. Statistics

Sept 2017 – Expected 2022

M.Sc. Statistics - GPA: 3.96

June 2016

B.A.Sc. Engineering Science - GPA: 3.66

June 2015

## AWARDS

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### Ontario Graduate Scholarship

2019-2021

*University of Toronto*

### MITACS Accelerate Fellowship

August 2018

*with Borealis AI*

### Faculty of Applied Science and Engineering Undergraduate Summer Research Fellowship

May 2012

*with Professor Birsen Donmez*

## RESEARCH ARTICLES

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### Riemannian Langevin Algorithm for Solving Semidefinite Programs

October 2020

*With Murat A. Erdogdu*

*arXiv Preprint, arXiv:2010.11176*

### Uniform Stability and High Order Approximation of the SGLD

June 2019

*With Maxime Gazeau*

*Workshop on Understanding and Improving Generalization in Deep Learning (ICML)*

### An Escape Time Analysis of SGD

December 2018

*With Philippe Casgrain, Gintare Karolina Dziugaite, Daniel M. Roy*

*Integration of Deep Learning Theories Workshop (NeurIPS)*

## RESEARCH PROJECTS

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### Collaborative Filtering Approach to Understanding Student GPA

July 2015 - April 2016

*M.Sc. Research Course - Supervisor: Professor Jeffrey Rosenthal*

### Numerical Methods for PDEs

Jan 2014 - August 2015

*B.A.Sc. Thesis - Supervisor: Professor Christina Christara*

## RESEARCH TALKS

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### Uniform Stability and High Order Approximation of the Langevin Algorithm in Non-Convex Learning

April 2019

*Statistics Graduate Student Research Day*

## WORK EXPERIENCE

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<b>Borealis AI</b> <i>Machine Learning Research Intern</i> Supported by the MITACS Accelerate Fellowship.	August 2018 - April 2019 Toronto, ON
<b>Ontario Teachers' Pension Plan</b> <i>Investment Analyst, Global Credit Products</i>	July 2016 - July 2017 Toronto, ON
<b>RBC Capital Markets</b> <i>Intern, Electronic and Algorithmic Trading</i>	May 2013 - August 2014 Toronto, ON

## TEACHING

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<b>ESC103 Engineering Mathematics and Computation</b> <i>with Professor William Cluett</i>	Fall 2017-2020 Toronto, ON
<b>STA286 Engineering Probability and Statistics</b> <i>with Professor Mark Ebdon and Professor Deepa Kundur</i>	Winter 2018 Toronto, ON
<b>STA410 Computational Statistics</b> <i>with Professor Keith Knight</i>	Fall 2017 Toronto, ON
<b>STA220 The Practice of Statistics</b>	Summer 2016
<b>STA248 Statistics for Computer Science</b> <i>with Professor Shivon Sue-Chee</i>	Winter 2016 Toronto, ON
<b>STA261 Probability and Statistics II</b> <i>with Professor Shivon Sue-Chee</i>	Winter 2016 Toronto, ON
<b>STA304 Survey, Sampling, and Observational Data</b> <i>with Neil Montgomery</i>	Winter 2016 Toronto, ON
<b>STA247 Probability with Computer Applications</b> <i>with Luai Al Labadi</i>	Winter 2016 Toronto, ON