

Sami Rodrigue

www.linkedin.com/in/samirodrigue/

Data Scientist

Python / R / SQL / Tensorflow / PyTorch / MapReduce / Hadoop / Spark / SAS

- Proven rapid learner who has conducted independent research and communicated novel models to experts in a field with no prior knowledge.
- Possesses a mix of technical and soft skills through working in roles that required attention to detail and conveying technical insights to a broad audience which provide the adaptability required for any challenge.

Experience

Research Assistant, Ryerson University – Data Science Lab (DSL) June 2017 – Present

- Collaborated with the Communication Research Center (CRC), research lab of Canada's telecommunication regulator, to combine DSL's expertise in machine learning with CRC's domain knowledge in telecommunication to gain insights in spectrum usage.
- Led the team in the implementation of Hidden Markov Models and Neural Networks in Python to predict channel occupancy using signal and weather data. Designed experiments to identify the combination of hyperparameters that minimized the error for the models. [\[Github\]](#)
- Gave biweekly presentations to CRC's managers and researchers on novel research in telecommunication and findings on exploratory data analysis of CRC's dataset.

Teaching Assistant, Ryerson University May 2016 – June 2017

- Developed and supervised labs for the Data Analytics course, in which professionals learn both the theoretical and practical uses of statistics by utilizing R. The course includes topics such as discrete and normal distributions, simulations and linear regression.
- Supervised lab sessions for the Data Organizations for Data Analysts course, where professionals were introduced to concepts in data modeling, relational and NoSQL databases, handling unstructured data and data mining such as classification and clustering techniques.

Data Analyst, Bank of Montreal – Capital Markets Sep 2015 – Jan 2017

- Aggregated data from source systems containing information about products sold to clients and revenues generated from each deal using SQL Server and internally-developed applications.
- Normalized and validated the collected data to produce monthly client profitability reports that are used to track managers' performances and to determine the goals for the next quarter.
- Conducted ad-hoc analyses on historical reports to investigate the source of lending revenues and identify the accurate allocation of revenues to the relevant product managers.

Education

Master of Data Science and Analytics (MSc) 2018

Ryerson University, Toronto, ON

Relevant Coursework: Machine Learning, Management of Big Data Tools, Algorithm Design for Massive Data, Natural Language Processing, Data Mining and Prescriptive Analysis [\[Github\]](#)

Master of Business Analytics (Dean's List) 2015

Schulich School of Business, York University, Toronto, ON

Bachelor of Commerce (Honours) 2014

Queen's University, Kingston ON

Projects and Completed Courses

- Predicted bugs in software using Hidden Markov Models following "*On the Use of Hidden Markov Model to Predict the Time to Fix Bugs*" by Habayeb, Mayy, et al. [\[Github\]](#)
- Predicted trends in Google searches with different Neural Network architectures and data augmentation techniques using PyTorch. [\[Github\]](#)
- Gained experience in Object Oriented Programming principles and theoretical analysis of algorithms and on their efficient development through online university courses in Data Structures and Algorithm Design.