

# Luigi Noto

luiginoto35@gmail.com · linkedin.com/in/luiginoto · github.com/luiginoto · luiginoto.github.io

## EDUCATION

---

**New York University**, New York, NY Expected 05/2023  
*MS in Data Science*, GPA: 4.0/4.0

- Relevant coursework: Probability and Statistics, Optimization and Linear Algebra, Machine Learning, Big Data, Information Theory

**Bocconi University**, Milan, Italy 07/2021  
*BS in Economics, Management and Computer Science*, Grade: 110/110 cum laude

- Relevant coursework: Advanced Mathematics and Statistics, Computer Programming, Machine Learning, Decision and Game Theory, Big Data and Databases
- Thesis: *Bayesian Learning: Clustering with the Dirichlet Process Mixture Model*

## EXPERIENCE

---

**New York University**, New York, NY 05/2022 - present  
Graduate Research Assistant - Agile Robotics and Perception Lab (ARPL)

- Contributing to research projects focused on Deep Learning and Robotics

**Bocconi University**, Milan, Italy 02/2021 - 08/2021  
Undergraduate Teaching Assistant

- Contributed to the improvement and typesetting in Latex of the teaching material for the bachelor class in Applied Stochastic Processes.

**Barclays**, Knutsford, UK 07/2020 - 08/2020  
Technology Data Analyst Intern

- Consolidated and analyzed data about Total Cost of Ownership and Technical Debt of the bank technology infrastructure to highlight trends and cost optimization opportunities, using SQL and data analysis software.
- Implemented data integrity checks and automated data concatenation tasks with Excel VBA macros, saving 3-5 hours of manual work per week.

## SELECTED PROJECTS

---

**MovieLens Recommender System and Extensions.** Built and evaluated a collaborative-filtering recommender system with Spark alternating least squares (ALS) implementation using the MovieLens dataset. Compared Spark's parallel ALS model to lenskit single-machine implementation in terms of efficiency and model performance. Implemented accelerated search at query time using Spotify's annoy spatial data structure.

**Analysis of Weather Data in Australia.** Performed hypothesis testing (resampling methods) on temperature data to investigate climate change. Trained and validated ML classification models to predict next day rain occurrence (XGBoost with 0.90 test AUC, 0.75 test average precision score).

**Loan Default Prediction.** Trained and validated ML classification models to predict the probability of default on a loan with a dataset about US small businesses (XGBoost with 0.93 test accuracy, 0.93 test sensitivity).

## SKILLS

---

<b>Computer</b>	Python, Numpy, Pandas, SciPy, Matplotlib, Scikit-learn, xgboost, PyTorch, Latex, R, SQL, Spark (PySpark), Git
<b>Language</b>	Italian (Native), English (Fluent), French (Basic)

## HONORS AND ACTIVITIES

---

- 3rd place at Vodafone Data Science Hackathon out of 40 participating teams (03/2021)
- Bocconi Merit Award, awarded to outstanding students based on academic standing (10/2020)
- Member of *Bocconi Students for Data Science* student association (09/2019-07/2021)

I hereby authorize the treatment of my personal data according to the local law.