# **DOINA VASILEV**



I'm currently a student of Data Science and Economics at the University of Milan. I'm passionate about quantitative analytics, specifically in the area of Economics, but I'm also interested in applying my technical skills in data analytics to other fields.

In the field of Economics I'm fond of Environmental and Labour Economics; however, I'm eager to expand my knowledge onto new domains, such as AI and healthcare.

I'm eager to work in AI, specifically in applying Machine Learning algorithms to different scenarios.

I'm also passionate about foreign languages; specifically, I've studied English, German and Russian during High School.

### **LANGUAGES**

English - Advanced knowledge

Italian - Native

Romanian - Native

German - Intermediate knowledge

Russian - Basic knowledge

## **CERTIFICATIONS**

IELTS English Certificate - C1 Level

Università degli Studi di Milano: CEFR English - C2 Level

## **COMPUTER SKILLS**

Microsoft Office: PowerPoint, Excel, and Word.

## Programming languages:

- Python for statistical analysis:
  - Pandas, Numpy, Scikit-learn, PySpark
- R
- SQL

Good knowledge of PostgreSQL and MongoDB Familiarity with AWS Cloud Services, Google Colab, DataBricks.

Canva and Prezi for presentations

Familiarity with video-editing tools and video-conference tools such as Microsoft Teams and Zoom.

## **CONTACT INFORMATION**

E-mail: vasilev.doina99@gmail.com

Telephone number: 388 399 0880

My <u>Linkedin</u>

You can find my projects at: https://github.com/doinav

#### **EDUCATION**

Master's Degree in Data Science and Economics

Università degli Studi di Milano

October 2021 - March 2024

Avg grade: 28.27

Milan

Acquired experience and knowledge in:

Programming languages such as Python, R, SQL

Machine learning algorithms

Deep Learning

Cross-sectional statistical analysis

Time series analysis

Cybersecurity

**Econometrics** 

Policy Evaluation

Language Models

Bayesian Analysis

Natural Language Processing

Large Language Models

# Currently writing my Master thesis:

Evaluation of Semantic Shift: The case of circular economy (Main supervisor: Professor Alfio Ferrara)

# Bachelor's Degree in Economics

Focus on Economics and Finance

Università degli Studi di Padova,

Padua, 2018 - 2021

Final grade: 103

I've developed skills and acquired knowledge on the economic, financial and banking systems.

I've written my final thesis on the impacts of human capital on industrial emissions (Supervisor: Prof. Thomas Bassetti)

#### Diploma di Liceo Linguistico

Istituto di Istruzione Superiore P. Scalcerle,

Padua, 2013 - 2018

## PROJECTS AND LABS

ISTAT: Organisation and data of the Italian national institute of statistics

April - June 2022

During the laboratory, I had the chance to learn how to read and interpret official statistical data in press releases, how to navigate datawarehouses, and how to trasmit and disseminate information.

# PRADA: Cloud and Distributed Environments for Analytics in a Luxury Brand

March - April 2023

Using PRADA's database, I've worked on generating a products' recommendation system, to be applied on PRADA's website.

To do so, we used ALS, i.e., Alternating Least Squares, a matrix factorization algorithm, using PySpark. During the lab I had the chance of learning DataBricks.

## PERSONALIZED HEALTHCARE:

May 2023 - September 2023

The project, in collaboration with the Department of Medicine and Biostatistics at the University of Milan, consists in training machine learning algorithms to model the relationships between aminoacids and sphingolipids. To do so, we used:

- Canonical Correlation Analysis, PCA and Kernel PCA, in order to detect potential linear and non-linear correlations.
- Bayesian Network Analysis, to analyse the conditional dependencies among the amino acids.

#### **WORK EXPERIENCE**

Junior Data Scientist

Internship

S2E: Business and Technology Consultants

Milano, Oct. - current

I work as a junior data scientist and analyst within the Advanced Analytics Business Line of a consultancy firm.

My tasks include:

- Performing analysis on data, and model data to generate forecasts.
- Monitoring production and setting targets.
- Tracking and remedying errors.
- Developing the software infrastracture of chatbots and other projects.

Alongside this, I am also involved in projects focused on developing Large Language Models for creating chatbots, generating texts, text translations and summarizations, among other things.

I've also prepared presentations for business meetings, and written an article on how to perform fine-tuning of LLMs, and presented our specific implementation of the techniques.

Throughout my role, I have gained substantial experience and consolidated key competences in AWS cloud services, Python, SQL, and artificial intelligence.

## Borsa Italiana Internship: Modeling, Clustering and Forecasting Post Trade data

Borsa Italiana

Milano, Jan. - March 2023

After a multiple-step interview process, I was selected among 35 other students to intern at Borsa Italiana.

During the internship I've gained experience with several machine learning techniques, such as XgBoost, CatBoost, and Neural Networks for modelling, clustering and forecasting Post Trade data.

In addition, I've gained experience with Amazon's AWS cloud services, and I've improved my coding skills in Python.

#### Tutor for "Data Science 4 Citizens"

University of Milan

Milano/Piacenza, Jan. - April 2023

I was assigned to a group of 5 high school students to tutor on data science.

I helped them develop a data science project: we first conducted an extensive exploratory data analysis on a dataset provided by Spotify Web API, on which we applied **linear** and **logistic regressions** to predict song popularity, and finally we performed **cluster analysis** of the data.

Finally, the project was presented during the event "Seeds from DEMM: #Next Generation Data".

The internship has helped me to improve my communication and visualization skills, as my main task required to explain complex concepts in an approachable but comprehensive way.

# Erasmus + Intership

Humboldt-Universität of Berlin

Berlin, 2017

I welcomed Erasmus students at the front desk and I was appointed to collect and check the required documents. In order to assist students successfully I was required to hold formal conversations in English, German, Russian and Romanian, given that many students came from different countries and had different language abilities.

Moreover, I was required to be helpful but also fast and efficient in providing solutions to their problems.

#### Promoter

Agorà s.r.l.

Padua, 2018

I worked in a team to help fundraise for NGOs such as Emergency and Amnesty International.

In order to do my job successfully I had to develop communication skills, with the scope of effectively transmit the objectives and the values of the NGOs.

#### **Tutoring**

Padua, 2018 - Present

I currently provide assistance to students in Maths, English, German, Russian and help students with their homework.

#### Intership

Libreria Progetto S.n.c.

Padua, 2016

I provided assistance to the workers.