# EDWARD PETERSON

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### **EDUCATION**

## 2023 - 2024 Imperial College Business School

London, UK

MSc Financial Technology

Core modules: Accounting and Corporate Finance, Big Data in Finance, Blockchain and Applications, Financial Econometrics in R/Python, Investments and Portfolio Management, Stochastic Calculus

Electives: Derivatives, C++, Computational Finance with C++, Advanced Options Theory, Fixed Income Securities

2022 - 2023 University of Bristol

Bristol, UK

MSc Economics & Finance (Distinction)

Empirical dissertation: Volatility Spillovers between Energy and the EU ETS Carbon Markets (78) Core modules: Microeconomics, Macroeconomics, Econometrics, Applied Econometrics, Asset Pricing

2019 - 2022 University of Bristol

Bristol, UK

BEng Engineering Mathematics (Second Class Honours - First Division)

Core modules: Mathematical and Data Modelling, Continuum Mathematics, Introduction to AI, Applied Statistics, Applied Optimisation Theory, Non-linear Dynamics and Chaos, Computational Neuroscience, Control Theory

2017 - 2018 Eton College

London, UK

Mathematics -  $A^*$ , Further Mathematics -  $A^*$ , Physics -  $A^*$ 

#### PROFESSIONAL EXPERIENCE

## 2023 The Pensions Regulator

Brighton, UK

Investment Intern

- Projected total asset quantities of DB and DC pension schemes to forecast a market majority switching date (~ 2030) in varying scenarios. Presented findings to actuarial and investment teams
- Produced a research report on use of, and diversification benefits of LTAF illiquid investments for DC pension schemes in context of productive finance investment, similarly presented findings
- Completed the Trustee toolkit and investigated LDI crisis for personal development

### 2023 University of Bristol

Bristol, UK

Research Project: Volatility Spillovers between Energy and the EU ETS Carbon Markets

- Reviewed emissions trading systems literature within broader literature of climate finance
- Modelled dynamic correlations using multivariate GARCH methods (rmgarch package), including simulated univariate parameter density analysis and Granger causality volatility transmission tests
- Wrote a 15,000 word thesis for submission. Reported summary to dissertation supervision group

## 2022 University of Bristol

Bristol, UK

 ${\it Group Technical Project: The Million Playlist Dataset Challenge}$ 

- Proposed a single stage, content-based filtering method of automatic playlist continuation utilising ANN (annoy) clustering, based on song feature vectors retrieved from the Spotify API, evaluated with Davies-Bouldin score and variance ratio criterion. TF-IDF NLP used for non-numeric features
- Led project and coordinated 4 team members, ultimately submitting a 10 page technical report
- Engaged with competition resources and metrics to determine overall APC performance

### ACHIEVEMENTS & LEADERSHIP

# 2017 - 2018 School Rugby

London, UK

- Captained  $3^{\rm rd}$  XV (2017) and represented  $1^{\rm st}$  XV (2018)
- Represented 1<sup>st</sup> Team at National VIIs Tournament, consecutive years

# 2015 - 2016 National Schools Rowing

London, UK

• Achieved two consecutive National Schools Rowing Men's Eights gold medals

## ADDITIONAL SKILLS & QUALIFICATIONS

#### TECHNICAL SKILLS

Proficient in: Python, C++, R, LaTeX, Git, Unix (Vim)

Experience in: C, MATLAB, SQL, Excel, VBA, Bloomberg/Eikon Terminal

#### LANGUAGES

English (native), German (basic)

## **CERTIFICATIONS**

GMAT: Total 700 (87th) | VR 36 (79th) | QR 48 (65th) | IR 7 (79th) | AW 5.0 (56th) | 1st Attempt - 11/03/23 Harvard CS50: Introduction to Computer Science

#### EXTRA CURRICULAR ACTIVITIES

- Imperial College Business School Student Investment Fund Quantitative Analyst & ICL AlgoTrading Society
- Computer Science e.g. ETH Oxford Hackathon bounty winner (Polygon ecosystem) at Oxford's Mathematical Institute, Low-level programming in C, Advent of Code 2023, Graph Theory, Dynamic programming etc.