



We offer **data science**, **software engineering** and **machine learning** services and bespoke **training courses**. We solve **real-world problems** by combining research-grade **statistical techniques** with a lean startup mentality.

Selected Projects



Think Ahead

Teaching Python to 8000+ finance professionals

Designed & delivered a 30 hour **online training course** covering **Python**, **pandas**, Jupyter, data analysis, Excel automation and **machine learning**. Launched on edX.



METROPOLITAN POLICE

Helping to fight crime with Python and pandas

Six-week workshop series to upskill police officers with **no coding experience** in using Python for data analysis.



HAWK-EYE

Teaching Hawk-Eye to track footballers in real-time

Three day **training course** covering **machine learning** with **scikit-learn**, intro to neural networks with **Keras**, and **convolutional neural networks** for video analysis.



MOORE Kingston Smith

Assisting accountants to automate audit analysis

Created a **Django** web interface and **database schema** for processing client bookkeeping data, plus a **REST API** to communicate with **Excel add-in** & front-end **dashboards**.

"This saves the team hundreds of fieldwork hours every week."

2021

2020

2019

2018

2017

2016

2015

JustPark

In-house data team for parking space marketplace

Company-wide data **strategy** and **KPI development**. Designed **BigQuery** data warehouse and **ETL pipelines**. Implemented **Looker** B.I. models and dashboards. **Geospatial** and machine learning **forecast** models.

NATIVE

Analysing supermarket shelves with deep learning

One-shot learning for object detection using **PyTorch**. **Image annotation** framework plus annotated images.



INDEPENDENT FRANCHISE PARTNERS™

Building early-warning systems for equity markets

Ingestion of **financial ticker data** plus **alternative data sources** into a data warehouse with automated ETL jobs. Machine learning R&D using custom-built **backtesting** tool.



BNP PARIBAS

Python & data analytics syllabus for a major bank

Designed a **workshops syllabus** covering topics such as using **Python** for data analysis, **Excel automation**, **web scraping**, time series modelling, and machine learning. We run **200+ workshops** per year for a global audience.



Instructor at General Assembly

Lead instructor for four **11-week data science courses** plus various workshops.

Our Team

The Coefficient team consists of **data scientists**, **software engineers**, **statisticians** and **machine learning PhDs**.

We're passionate about **open source**, **open data**, **agile delivery** and building a culture of **excellence**.



John Sandall | CEO & Principal Data Scientist

Experience: Lead Data Scientist at YPlan, business analytics at Apple, maths/genomics at Imperial College London, ed-tech startup founder.

Projects: PyData organiser. Fellow of Newspeak House. Founded SixFifty. Founded Humble Data to promote diversity in data science.