Marco Edward Gorelli

Education

MRes, Mathematics of Planet Earth; 2016-2017; Imperial College & University of Reading MSc, Mathematics and Foundations of Computer Science; 2015-2016; University of Oxford BSc, Mathematics with Professional Practice; 2011-2015; Brunel University London

Open source (pandas)

- Volunteer maintainer since Jan 2020, have reviewed 60+ pull requests
- Added new method DataFrame.to_markdown, which was featured in the v1.0.0 release notes
- Fixed bugs in groupby.apply, groupby.agg, groupby.nunique, explode, Categorical, visualisation, and more

Experience

Data Scientist at Samsung R&D Institute UK; Nov18 - now

- Mentored fellow employees by co-organising internal machine learning reading group: presented on SHAP values, markov chains, and bayesian methods
- Improved accuracy/interpretability of hierarchical forecasting models and maintainability of source code (*Prophet*, *statsmodels*, *Jupyter Lab*, *CircleCI*, *pre-commit*, *Google Cloud Storage*, *wily*, *SHAP*)
- Deployed end-to-end web-scraping dashboard, including tests, automated documentation, static type-checking (*Google Cloud Platform*, *streamlit*, *scrapy*, *ScrapingHub*, *pymongo*)
- Deployed end-to-end anomaly detection module for sensor data (*pytest*, *sphinx*, *MongoDB*, *mongomock*, *PySpark*, *AWS EMR+S3*, *Docker*, *mypy*)
- Debugged Python and C++ code, allowing for Python ML model to be reliably deployed to wearable (*Tizen Studio*, *opencv*, *scikit-learn*, *pandas*)
- Passed internal "Advanced Software Engineering Test (C++)" (£500 reward)

Data Scientist at Sedex; Jun18 - Nov18

Produced interactive dashboards and performed analytics on survey data (Tableau, PostgreSQL)

Data Scientist at Sensium; Jan18 - May18

Rewrote internal visualisation/reporting tool from Matlab to Python (PyQt, reportlab, matplotlib)

Risk Analyst Intern at General Electric Capital International; Jun13 - Jun14

• Reporting on data from credit risk agencies (SAS)

Other achievements

- During BSc: Foster Award for "exceptional mathematical ability", Level2 Award for highest grades
- Kaggle: 2019 Data Science Bowl: top 11% (time series, tabular data, *LightGBM*); Google QUEST Q&A Labeling: top 13% (NLP, *tensorflow*, *keras*, *BERT*); University of Liverpool Ion Switching: top 15% (signal processing, WaveNet)

- Coursera: "Deep Learning Specialization", "Applied Data Science with Python Specialization"
- Holder of Tutoring Standards' Professional Tutoring Certificate

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