Marina Charquero Ballester

Department of Media and Journalism Studies, Aarhus University
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Work Experience

Postdoctoral researcher, Aarhus University — May 2020 – present

Use of data science and natural language processing to study public emotion and collective behaviour on social media

Postdoctoral researcher, University of Oxford — April 2019 – April 2020

Characterisation and prediction of neuropsychiatric disorders through Bayesian modelling of brain neuroimaging data

Postgraduate Research Assistant, University of Oxford — Nov 2014 – Apr 2015

Development of analysis pipelines for a big data project (Human Connectome) studying the microstructure of brain white matter tracts.

Postgraduate Research Assistant, University of Oxford — Nov 2013 – Nov 2014

In vivo characterisation of the integrity of the basal ganglia to predict onset of symptoms in Huntington's disease

Education

PhD in Medical Sciences, University of Oxford — May 2015 – May 2019

MSc in Cognitive and Clinical Neurosciences, Maastricht University — Sep 2011 – Aug 2013

BSc in Psychology, University of Valencia — Sep 2006 – Jun 2011

Technical skills

Programming languages	Python, Matlab, Bash, SQL
Machine learning	Statistics, Bayesian models, Natural Language Processing, supervised and unsupervised methods for data analysis

Other training & activities

AI for Good Foundation, London — Sep 2019-March 2020

- Developing an AI agent to raise awareness and provide guidance in cases of domestic violence

Danish Big Data Centre for Health and Environment — 28 Aug -3 Sep 2019

- Attendance to summer school on experimental design and data analysis for data from personalised sensors

Publications

Nissen IA**,** Walter J, **Charquero-Ballester M**, Bechman A. Digital Infrastructures of COVID-19 Misinformation: a new conceptual and analytical perspective on fact-checking. In review

Charquero-Ballester M*, Walter J*, Nissen IA, Bechman A. (2021) *Different types of misinformation have different emotional valence on Twitter.* Big Data and Society; 8(2)

Charquero-Ballester M, Kleim B, Vidaurre D, Ruff C, Williams SCR, Stark EA, McManners H, Bar-Haim Y, Woolrich M, Kringelbach ML, Ehlers A. (2020) *Effective psychological treatment for PTSD changes the dynamics of specific large-scale brain networks.* In review

Pflanz CP, **Charquero-Ballester M,** Majid A, Winkler AM, Vallee E, Aron AR, Jenkinson M, Douaud G. (2020). *One-year changes in brain microstructure differentiate preclinical Huntington's disease stages.* NeuroImage: Clinical; 25

Warrington S, Bryant KL, Khrapitchev AA, Sallet J, **Charquero-Ballester M,** Douaud G, Jbabdi S, Mars RB, Sotiropoulos SN (2019). *XTRACT-Standardised protocols for automated tractography and connectivity blueprints in the human and macaque brain*. NeuroImage; 217

Stark EA, Parsons CE, Van Hartevelt TJ, **Charquero-Ballester M,** McManners H, Ehlers A, Kringelbach, ML. (2015) *Post-traumatic stress influences the brain even in the absence of symptoms: a systematic, quantitative meta-analysis of neuroimaging studies.* Neuroscience Biobehavioural Reviews; 56: pp. 207-21