University of Glasgow | Institute of Neuroscience & Psychology

European Research Council
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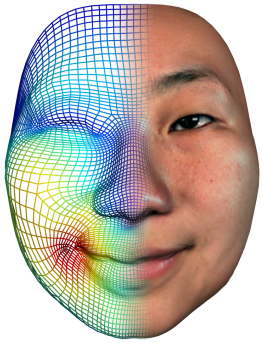
FACE SYNTAX



OPEN INTERNATIONAL COMPETITION
Fully funded 3-year PhD Position

Prof. Rachael Jack is offering a fully ERC-funded Ph.D. opportunity on the project ***Computing the Face Syntax of Social Communication*** at the Institute of Neuroscience & Psychology and School of Psychology at the University of Glasgow, Scotland, UK.

The project
This ambitious project aims to mathematically model the human face as an algebraic generator of dynamic social signals and build a psychologically and culturally valid generative model of social face signalling that is transferrable to social robots. The project will use a multidisciplinary approach that combines social and cultural psychology with dynamic 3D structural face computer graphics, vision science psychophysical methods, and mathematical psychology. As the project involves interdisciplinary knowledge and skills the ideal candidate would have experience of both computational (e.g., programming) and social psychology, for example via a joint degree or research experience/interests.

Research environment
The successful applicant will experience a unique and intellectually stimulating research environment within the Institute of Neuroscience & Psychology, undertake a specific programme of specialist research skill development, and contribute to progressing a strategic research agenda. The applicant will have access to (1) state-of-the-art 4D structural face imaging technology; (2) specialist in-house training on quantitative methods and statistical analyses (e.g., 4D image processing, model fitting); (3) postgraduate/postdoctoral communities; (4) a dedicated Research Technologist specializing in 3D and 4D computer graphics; (5) a dedicated IT support team providing data storage (>4 Petabytes), high-security data management systems, high-performance equipment and software; (6) an online Subject Pool (7,000+ members, 106 nationalities); and (7) international collaborators.

The Team

Primary supervisor: Prof. Rachael E. Jack
http://www.gla.ac.uk/schools/psychology/staff/rachaeljack/

Secondary supervisor: Prof. Philippe G. Schyns
http://www.gla.ac.uk/researchinstitutes/neurosciencepsychology/staff/philippeschyns/

The successful applicant will join an internationally renowned high performance and interdisciplinary research team, and will receive regular close supervision from Jack via weekly lab meetings to develop specialist knowledge and skills including 3D & 4D face capture and generation, advanced MATLAB programming, lab preparation, data collection, computing face signalling models, analyzing high-dimensional data, scientific writing, and producing high-quality data visualizations for presentations and publications. The successful applicant will also have the opportunity to present at national and international academic conferences, participate in public engagement activities, and submit their work to high-impact and specialist peer reviewed academic journals. Successful applications could also have the opportunity to work with other interested parties (e.g., social robotics designers).

Required qualifications
- Outstanding academic record. At least a 1st Class Honours Bachelor's degree or Master's degree with Distinction in Psychology, Cognitive Science, Neuroscience, Computer Science, Engineering, or related fields;
- Excellent team working, organizational, interpersonal, and communication skills;
- Demonstrated interest or research experience in psychology, social robotics, communication, or related fields;
- Undergraduate level knowledge of statistics and data analysis;
- Strong work ethic

Preferred qualifications
- Computer programming skills (e.g., MATLAB, OpenGL, Python, Java)

Start date: September/October 2021

Application guidelines
Apply here: https://www.findaphd.com/phds/project/phd-in-psychology-computing-the-face-syntax-of-social-communication/?p131759

Questions? *Just ask!* Contact Prof. Jack at rachael.jack@glasgow.ac.uk