PI profile

## Luke Jostins-Dean

|  |  |
| --- | --- |
|  | **Dr Luke Jostins-Dean**  **Title**: Sir Henry Dale Fellow  **Location**: Kennedy Institute of Rheumatology  **Division**: Medical Sciences  **Group**: Statistical Genetics of Immune Variation  **Website**: <https://www.kennedy.ox.ac.uk/research/jostins-group-statistical-genetics-of-immune-variation>  **Email**: luke.jostins@kennedy.ox.ac.uk |

### GMS themes:

### Research Overview

Our research is focused on identifying genetic associations with diagnosis or disease presentation in a range of inflammatory diseases, and developing statistical techniques to understand the function of these genetic risk variants. To translate disease genetics into real diagnostic, prognostic or treatment solutions we need to understand these pathways from genetic variation through healthy immune variation to disease risk. It is only through close collaborations between statistical geneticists, immunologists and molecular biologists that we will start to untangle these pathways.

Our group has three interrelated strands. The first is the analysis of large-scale human cohort data using statistical and computational techniques that are specifically designed to identify multi-gene signatures of shared underlying immune variation. The second is to collaborate with other researchers to generate and analyse human immune variation data (including host immune function and exposure to both commensal and pathogenic organisms) in order to tie genetic risk of disease to variation in specific measurable immune phenotypes. The final strand is to collaborate with immunologists, cell biologists and clinical researchers to develop new ways of measuring the function of the human immune system in order to profile the specific pathways that confer genetic risk of chronic disease.

Project areas: [please include several keywords or phrases reflecting your research area and proposed projects.]

### Specific project proposals:

* Predicting the genetics of immune response from baseline quantitative traits

Please contact directly for further information.

*These pages were reviewed/updated:* ***10/06/2022***

Project proposal

# **Title**: **[Project title here]**

Supervisors: [name and title of relevant individuals]

Wet/dry lab mix (approx): X% wet lab, X% dry lab

### Description:

[Write a ~ half-page page description of the project here].

### Training Opportunities:

[Write a brief description of the training opportunities the project will provide].

### Background reading / references:

Please include references as desired. Suggested format:

* [Surname] [Firstname], [other authors]… **(year in bold)** . [Title]. [Journal name], [other details]. Available at: [link]

Insert any additional project description(s) on subsequent pages if applicable. Please use the same template and use separate pages for each project.