



Microscopy Image Analysis Group Recruitment

- **Head of Image and Data Analysis Group**
- **Image Analysts (3 Posts)**

**Laboratory of Raimund Ober and E. Sally Ward
Centre for Cancer Immunology
University of Southampton
UK**

Head of Group (permanent post): £50,132 – 63,011 p.a.*

Senior image analyst (two positions): £38,460 – 48,677 p.a.*

Image analyst (one position): £30,395 – 37,345 p.a.*

***Additional supplements are available for exceptionally qualified applicants**

Applications are invited for the members of the newly established bioimage analysis group in the Centre for Cancer Immunology at the University of Southampton. The team will have a major impact on the scientific mission of the laboratory by carrying out and supervising advanced research projects. They will work closely with the microscopy group and the biomedical experimentalist, and apply their state-of-the-art technologies to cutting edge biological and biotherapeutics development projects.

These positions will be located in the laboratory of Professors Ober and Ward who are currently relocating their research group from the USA. Our interdisciplinary research program is devoted to the development of novel antibody-based therapeutics that, to date, have led to several new therapeutics that are currently in advanced clinical trials. This focus is supported by the development of advanced microscopy approaches, in particular methods for imaging and analyzing single molecule and subcellular trafficking. Hence, we have a compelling need to develop new image analysis approaches and supporting software tools, and this has been a major area of our work. This research program is

supported by major grants from the Wellcome Trust, Cancer Research UK, Faculty of Medicine and collaborating biopharma companies.

Many of our research projects require the development of dedicated novel analysis methodologies, always driven by the need to answer a bio-medical question. The image analysis team will work initially in developing new tools for single molecule microscopy, including tracking and superresolution microscopy, and the analysis of live cell microscopy data. However, we plan to incorporate several new imaging modalities into our experimental platforms, and these will require new and advanced analysis methodologies.

While not every member of the team will be an expert in each of the disciplines, the team will have strong expertise in software development (primarily Java and Matlab) and extensive experience in advanced image and data analysis methodologies. In addition to the support of the research projects in the group, it is expected that the image analysis group will also be involved in high-level research related to image analysis methods development and the implementation of these new methods in suitable software. A major platform will be the Java-based image analysis framework that has been developed in the laboratory over recent years. The team will also have opportunities for research projects in image analysis and software methods development.

While image analysis for microscopy will be the main focus of the team, there will be other opportunities for data analysis and the development of data analysis methodologies for problems that arise from the research projects in the group and collaborators. The team will also have oversight of the data management software and hardware of the laboratory.

The posts will be located in the Centre for Cancer Immunology at the Southampton General Hospital, a newly constructed research building that is the result of a significant fund-raising campaign. The Centre builds on a 40 year history of pioneering immunology and cancer research at Southampton. It is the first dedicated cancer immunology centre in the UK that brings the complete research pipeline under one roof: from pioneering discovery science to applied research and preclinical modelling and crucially onto first-in-human clinical trials and beyond. It is home to world-class research facilities, state-of-the-art scientific laboratories and a Clinical Trials Unit. These positions are amongst at least 20 new research and other staff who will work with existing investigators to build on the exciting progress already made in the field of cancer immunology.

The head of the group will be an efficient/capable manager able to carry out research projects and oversee laboratory members in a highly interdisciplinary setting. The position requires significant, independent interactions with collaborators within and outside the university.

All members of the image analysis group will possess relevant academic qualifications/work experience, good IT skills, ability to plan/organize their workload, use initiative, work well under pressure and communicate effectively/professionally with a range of stakeholders within and outside the organisation.

Please send expressions of interest to Prof. Raimund J. Ober at raimund.ober@gmail.com.