

George's Academic Training (GAT) Newsletter

March 2019

George's Academic Training initiatives 2019:-

- Submit bid for NIHR Integrated Academic Training 2020 Competition and Formula Allocation of ACFs and CLs
- Research Aware seminar series
- Postgraduate Certificate in Healthcare Research Skills and Methods
- George's Academic Training (GAT) small grant fund



Welcome to St George's!

Dr Aisleen Bennett has been appointed as Clinical Lecturer Paediatric Infectious Diseases and Immunology with a start date of 4 March 2019. This is a locally-funded clinical academic post, 100% funded by St George's University Hospitals NHS Foundation Trust.

In this issue:-

- Find out more about:- Research Aware seminar series, PgCert in Healthcare Research Skills and Methods and GAT small grant fund
- News from our trainees
- Research Day 2018 and GAT autumn workshop
- The South East (SE) Regional Society for Academic Primary Care (SAPC) Conference (SAPC)
- SGUL Professional Education short courses

'ResearchAware'

Research Skills & Methods Series 2018/2019



The GAT team are running a pilot research skills and methods training series called 'Research Aware'. These events are open to all across St George's university, Trust and Faculty and are of particular relevance to clinicians and allied health professionals who are:

interested in doing research and potentially developing their own projects

active researchers who wish to build, broaden or refresh their knowledge

Events arranged so far range from critical appraisal, statistical vs clinical significance, epidemiological research approaches, systematic review and meta-analysis. Future topics in this series will include 'how to write a fellowship application', Patient and Public Involvement in Research, and Lab techniques – taster sessions.

Full details and booking information can be found on our webpage:

Postgraduate Certificate in Healthcare Research Skills and Methods

The proposal for a new PgCert in Healthcare Research Skills and Methods is currently progressing through the university's validation process. This course will allow St George's and the Joint Faculty to upskill pre-doctoral, postgraduate healthcare academics and better equip them to be competitive for advanced research funding.

The Course: A flexible, modular, part-time course, over a minimum of 9 months & maximum 2 years, focusing on knowledge, behaviours and attributes required to become a successful healthcare researcher, using the Researcher Development Framework as a foundation.

Learning Aims

- 1) To provide an excellent foundation for critical understanding and evaluation of the design, conduct, dissemination and funding of research (from pre-clinical to healthcare);
- 2) To equip participants with the knowledge, skills and attitudes to enable them to commission or undertake their own original research and become effective healthcare researchers.

If the validation process is completed successfully, the aim is to start the course in October this year.

For further information please contact rparker@sgul.ac.uk

GAT Small Grant Fund

Funds have become available to set up a 'George's Academic Training (GAT) Small Grand Fund'. The fund will offer 5 awards per year of up to £1500. Details of eligibility criteria and how to access the fund will be circulated within the next few months.

News from our trainees

Joseph Westaby - Cardiac Risk in the Young Clinical Research Fellow



Joe was appointed as an NIHR academic clinical fellow and histopathology specialist registrar at St George's in 2016. He has worked under the supervision of Professor Mary N Sheppard undertaking research into sudden cardiac death.

During this time, he has gained his certificate of higher autopsy training and his fellowship of the royal college of pathologists. He has chosen to specialize into thoracic pathology.

Joe has presented at numerous conferences including a plenary presentation at the 10th Joint Meeting of the British Division of the International Academy of Pathology and the Pathological Society of Great Britain & Ireland. He has won the British Association of Forensic Sciences Medical Prize and a distinction prize for a presentation at the National Academic Trainee Network Meeting in Cambridge.

Joe regularly lectures in the medical school and has supervised a BSc student.

Joe has now successfully gained initial funding from Cardiac Risk in the Young to undertake a PhD into cardiac innervation in the inherited cardiomyopathies. He has also earned a grant to cover consumable costs from the Pathological Society.

Joe's project is entitled "Is cardiac innervation altered in the inherited cardiomyopathies? A quantitative histological study". Joe will be using immunohistochemistry, slide scanning and digital image analysis to establish whether differences are seen in the nerves in the different cardiomyopathies: hypertrophic cardiomyopathy, dilated cardiomyopathy and arrhythmogenic cardiomyopathy. This will be supplemented by three dimensional image analysis using tissue clearing, immunolabelling and light sheet microscopy.

Good News!

NIHR expects IAT partnerships to develop locally funded clinical academic posts that can be NIHR branded (if eligible) or matched to NIHR funded posts.

SGUL has established **8 locally funded clinical lecturer posts** - Paediatric Infectious Diseases, Obstetrics and Gynaecology, Neurology, Neurosurgery, Cardiology and Vascular Surgery along with two Chadburn Lecturer posts.

News from our trainees



Katherine Josephs – ACF in Clinical Genetics

I am involved in the research of a group of patients with congenital vascular malformations. This fascinating group of patients can have something as simple as a birth mark to something life changing such as an arterial-venous malformation in the brain. Many of our patients have come through the lymphedema clinic and therefore present with a constellation of problems including lymphedema, overgrowth of one or more limbs, and vascular malformations. Although there has been significant progress in elucidating the underlying genetic cause of these malformations, there are still many patients who remain without a diagnosis. Knowing the genetic diagnosis is crucial as it enables increased understanding of underlying molecular pathways and ultimately can lead to the discovery of new therapeutic targets.

Meeting Report

As part of my work on this project, I went to the International Society for the Study of Vascular Anomalies (ISSVA) biannual conference in Amsterdam last year. This is widely attended by interventional radiologists, vascular surgeons, dermatologists, and geneticists from all over the world. What was particularly striking was the complexity involved in managing these patients and the clear necessity of adopting an MDT approach. In light of this, vascular anomaly centres are being set up and are indeed already running across the world. Numerous topics were covered but I was particularly interested in the discovery of novel mosaic variants associated with certain vascular malformations and how this can impact on treatment. Some genetic variants are not in every cell of the body, they are only present in a certain population of cells. This is genetic mosaicism. An everyday example of this is the tortoiseshell cat and their different coat colours. Similarly, it is hypothesized that vascular malformations are caused by a mosaic variant only present in the abnormal cells within the malformation itself.

One group led by Dr Veronica Kinsler at Great Ormond Street Hospital presented their work on a group of patients with intracranial and extracranial vascular malformations. They discovered novel mosaic variants in 4 genes in the RAS-MAPK pathway (Al-Olabi et al). This is a molecular pathway commonly activated in cancer. Inhibitors of the RAS-MAPK pathway already exist and are used for cancer treatment. Following this discovery, the group went on to model the vascular malformation in transgenic zebrafish and importantly showed that a BRAF inhibitor, Vemurafinib, was an effective treatment. This group have demonstrated the power of making a genetic diagnosis and how this can allow the repurposing of existing drugs for the personalized treatment of these patients. This is truly translational medicine.



SGUL's annual Research Day will be held on Tuesday 3 December 2019. The Research Day website will be updated during the year as details of the event are confirmed. Clinical academic trainees should be prepared to submit a poster — posters from previous meetings will be accepted.

Research Day



SGUL's annual Research Day was held on Wednesday 21 November 2018. The programme theme for the morning lecture session was "Human Life Course and Healthy Ageing". The **The Thomas Young Lecture** was given by <u>Professor Thomas young Zglinicki</u>, Professor of Cellular Gerontology at Newcastle University on the topic "Cell senescence drives ageing of body and mind'.



The lively afternoon poster session provided a showcase for the university's research with 93 posters exhibited by undergraduates, postgraduates and academic staff.

Prizes were awarded for the best undergraduate, postgraduate and MRes posters along with the £1000 Chrissie Fenske Research Poster Prize for the most innovative research poster.



Autumn GAT workshop

The GAT Workshop held on Friday 7 September 2018 had the theme "How to make the most of your Academic Fellowship at St George's".

Two George's ACFs, Mark Russell and Zoe Rutter-Locher gave presentations on the subject "NIHR ACFs - audits and research projects that can be completed within a 4-6 month period leading to publications".

These were followed by a presentation on **NIHR funding streams** by Tom Pratt, Senior Programme Manager, NIHR Academy.

The workshop was well-attended by over 30 SGUL and SGH Trust students, trainees and staff.

Please email **Yvonne Forde** for copies of the presentations.

NIHR Doctoral Fellowships and Partnership Fellowships – deadline 18th June 2019

NIHR Doctoral Fellowships and Partnership Fellowships will open for applications in April 2019 with an expected deadline of 18th June 2019 for stage 1 applications.

Eligibility, assessment criteria and all other guidance about this opportunity is available online.

The South East (SE) Regional Society for Academic Primary Care (SAPC) Conference (SAPC)

The 2019 annual SE Regional SAPC was organised by Kings' College London, ran over two days and was held in January at Madingley Hall, Cambridge.

The theme of this year's conference is highly topical: *Digital Futures in Primary Care?*, a subject with potential challenges as well as new opportunities for teaching and research which was discussed and explored by the keynote speakers, including Professor Chris Salisbury and Dr Zoe Williams.

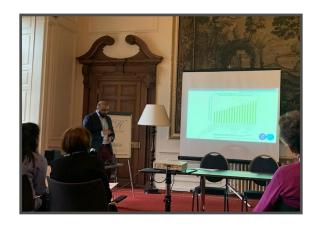
St Georges' were well represented, including presentations from Dr Shaleen Ahmad (NIHR In Practice Fellow) and Academic GP Trainees Dr Umar Chaudhry and Dr Roaa Al-Bedaery. PHRI's Professor Harris and Professor Oakeshott also presented.

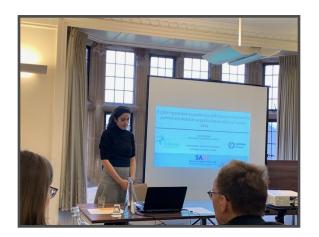
Dr Shaleen Ahmad presented work on 'The rising tide of dementia death: triangulation of data from death certification, hospital records and the Clinical Practice Research Datalink', which explored the recording of dementia in different data sources and looked at trends over time.

Dr Umar Chaudhry presented his work completed as part of his Masters' dissertation assessing the Learning Needs of GP Trainees in Undertaking Telephone Consultations.

Dr Roaa Al-Bedaery presented qualitative work on the patient's perspective in COPD and its management which was conducted with The Cochrane Airways Collaboration based at St Georges.'

Professor Tess Harris, Professor of Primary Care in the Population Health Research Institute promoted delegates' physical activity with her popular early morning power walk.





SGUL Professional Education - short courses

Acute Neurology – 12 June 2019

About the course: The inaugural St. George's Hospital Acute Neurology Masterclass aims to provide an overview of the management of common and emergency neurological problems presenting to hospital. Topics covered include acute headaches, stroke and stroke mimics, seizures and status epilepticus, dizzy spells, functional neurological disorders, MS and neuromuscular emergencies. From £40

More information can be found <u>here</u>

Practical course on ECG interpretation in the young and athletes - 25 June 2019

About the course: The course is focused on the interpretation of ECG in young individuals (14-35 years) and in athletes. The spectrum of cardiac conditions potentially detected at the ECG in the young is broad with significant differences with the ones characterizing older patients. Furthermore, ECG interpretation in athletes requires careful analysis to properly distinguish physiological changes related to athletic training from findings suggestive of an underlying pathological condition. From £45

More information can be found here

The comorbidities of Epilepsy – 5 July 2019

About the course: Epilepsy is one of the most common, chronic neurological condition in the UK. The course will offer a practical grounding in the most common co-morbidities associated with epilepsy. This is an area of growing clinical interest, and relevant to the care of patients with epilepsy. The course aims to provide a basic grounding in the epidemiology, nature, diagnosis and treatment of common co-morbidities in patients with epilepsy. From £25 More information can be found here



We support health and social care researchers at all stages of preparing grant applications

Please visit the <u>RDS website</u> for details of the RDS South London drop-in sessions