

Emma Howard and Reinette Hampson







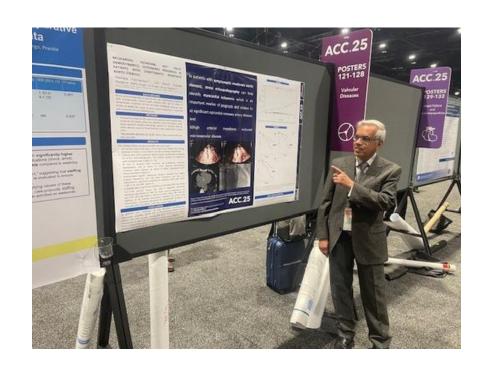
Who we are

What we do

How you can help

The Team









Prof Roxy Senior

Director of Cardiac Research/ Consultant Cardiologist Richelle Gallos - Research Nurse
Dr Leigh-Ann Wakefield - Research Fellow
Dr Sumantra De - Research Fellow
Emma Howard - Business/Research Manager
Minoo Shah - Office Manager

Jo Evans - Senior Research Nurse
Abi Adebayo - CRP
Reinette Hampson - Physiology
Research and Education Lead

What do we do?









2024 - 2025

684 cardiac patients took part in research studies at Northwick Park Hospital

Research studies looking at: coronary artery disease, heart failure, out of hospital cardiac arrest, new heart imaging techniques, inflammation, pulmonary embolism, heart intervention techniques



ARISTOTLE Trial: Apixaban a new treatment for atrial fibrillation (AF) CARDIAC RESEARCH

atrial fibrillation

- heart beats too slow, too quickly or in an irregular way
- o for patients who have this all the time it is important to take medication to thin the blood, which reduces the risk of developing clots which can cause a stroke
- warfarin was standard treatment for patients with atrial fibrillation
 - o small differences in dose can be ineffective or cause harm (needs a lot of monitoring)
 - o interactions with other medicines and foods
 - bleeding risk
- 18,201 patients, 39 countries, 1034 sites, including Northwick Park
- double blind, double dummy: apixaban vs warfarin
- 5 years, patients came for regular visits with study Doctor and Nurse
- results: apixaban more effective at reducing risk of stroke, blockage of other blood vessels in the body

Apixaban Tablets 5 m.

- and had a lower bleeding risk
- new class of medications called "novel" or "direct" oral anticoagulants
- a new treatment option that will work better for some patients with AF

SELECT Trial: Semaglutide a new treatment for heart disease

- all new medication for diabetes undergo additional research to check that they are safe for the heart and cardiovascular system
- sometimes they are found to be protective for the heart, and new trials are designed to see if they can also be used as a treatment for heart disease
- semaglutide GLP-1 inhibitor
- 12,256 patients, 41 countries, 804 sites including Northwick Park
- patients who already had heart or cardiovascular disease and had a weight and height ratio that classified them as overweight or obese
- patients took their usual heart medications plus either semaglutide or placebo (double-blind)
- 5 years, patients came for visits every 3 months with study Doctor and Nurse
- adapted over COVID-19 pandemic: courier for study medication, telephone visits
- Results: effective at reducing the risk of another cardiac event (e.g. a heart attack or stroke) by 20%



Current studies





~20 studies at any time, all in different stages, some actively recruiting new patients and some in follow-up

Long term NHS goal that when patients are given a diagnosis, they are given a range of different treatment and research options

We aim to balance our studies so that we can offer patients with a range of different heart conditions the opportunity to take part in research if they would like

Sometimes some conditions attract a lot of research investment because there either isn't a treatment yet, or there are limited treatment options. At the moment HFpEF, disproportionately affects minority ethnic groups. We have become a UK leader at running early phase (Phase 2) trials in this area, often recruiting the first or only patients in the UK. Our patients with this condition really appreciate the extra support and follow-up from being in these studies and often take part in multiple trials with us

SECURE Trial





Dr Leigh-Ann Wakefield, Cardiac Research Fellow/ Specialist Registrar

Currently, patients who need non-emergency assessment for possible angina and chest pain symptoms are referred by their GP to our Rapid Access Chest Pain service. If needed, they can then be referred for a test to check the heart arteries for any narrowings caused by heart disease. The two main non-invasive tests patients might be referred to are:

- CTCA: can show us if there are narrowings but struggle to tell us how severe these are. It also uses some radiation
- Stress echocardiography: can show us blood flow which can indicate if there is a severe narrowing but cannot find smaller narrowings which might benefit from early tablet treatment

No one test tells Doctors everything they need to know in one go.

Carotid ultrasound: research shows if there is some narrowing in our neck arteries, there is very likely narrowing in the heart arteries as well.

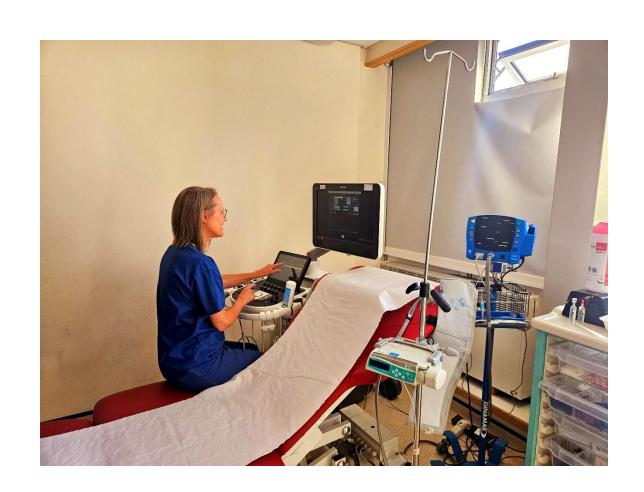
Combining stress echocardiography and carotid ultrasound will hopefully allow us to detect both small and severe disease.

- If effective, we will have one test which can tell Doctors a lot more, including whether patients can start medication earlier to prevent narrowings getting bigger
- If effective this test does not expose patients to radiation (as CTCA does) so would be safer for patients

So far 569 patients have agreed to take part. 719 by end of October 2025.

Provide cardiac tests to other research teams





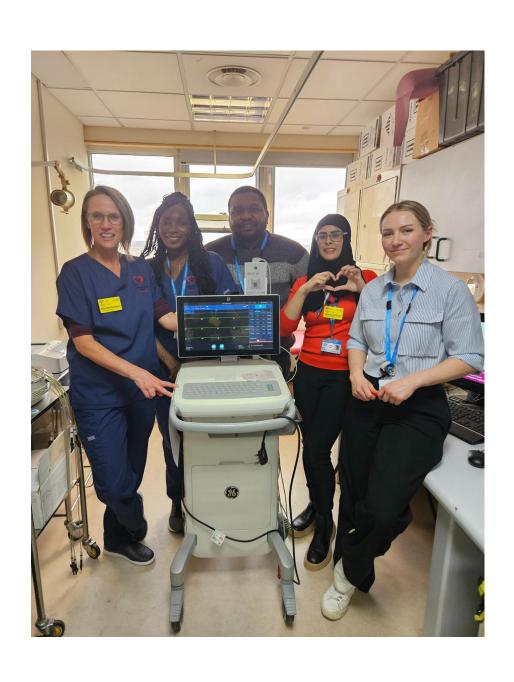
Sometimes other research teams need a specialist cardiac test or reading of a test result as part of their study

Without these tests by a specialist team, these studies could not run, so there would be less advances in treatment and knowledge for patients

We provide tests like ECGs and all different kinds of echocardiograms (ultrasounds of the heart)

We provide tests for ophthalmology, dermatology as well as other hospitals like the Royal National Orthopaedic Hospital and even private companies like PAREXEL and HMR

Education: ECG workshops for other characteristics research teams



Electrocardiogram (ECG) is a test that measures electrical activity of the heart. It helps to understand important information about the heart's rhythm and can help diagnose various heart conditions.

It is therefore an important test in research studies. It is a common test in research protocols, especially for drug trials – for all specialities, not just cardiology.

But research teams are not always confident in how to perform and interpret the test.

We offer a one-day workshop for research staff from other teams and Trusts to learn the theory and then spend the afternoon with a volunteer patient practicing ECGs.

Education: Stress Echo and Contraction Workshops



Echocardiography (ultrasound of the heart) is routinely performed by Physiologists and Sonographers.

Stress echocardiography, taking pictures of the heart at rest and then after exercise, is a more specialist test that requires extra training and support.

Sometimes contrast is used as part of this test to help take more clear pictures of the heart.

To support colleagues develop their knowledge and skills in this area, and support them in reaching the required standard to pass their BSE exams, we offer workshops for colleagues from all around the country.

We are always looking for ways to support more colleagues in developing their knowledge, skills and experience as this will mean more availability of tests for patients and better quality of pictures taken from these test to help diagnose heart disease.



How can you help?



Would you like to take part in a research study?



If you are a patient of LNWH Trust and have a diagnosed cardiac condition

Are happy for us to look through your medical record and see if it would be safe and suitable for you to take part in one of our current research studies

If there is a study you would be eligible for, we normally invite patients to come for an information visit, with a family member or friend, meet the study doctor, talk about the study and take some written information home to think about. You can consider it and decide if it is something you'd like to do. You can always say no and it will never affect your care and you have the right to withdraw at any time

We might not have something right now, but we could contact you in the future if something comes up



Would you like to help us design a new research study and patient materials?





Dr Sumantra De, Cardiac Research Fellow/Specialist Registrar

Currently designing a new research study, starting in October 2025, looking at how we can use images of arteries in the neck to help diagnose and treat heart disease

Before we submit the study for ethical approval we would like to ask cardiology patients for their thoughts and input on some of the design of the study and information we will give to patients. We would welcome input from everyone, but would especially like to hear from Asian, Afro-Caribbean and female patient as they are historically under-represented in cardiac research studies.

We will hold a small patient group at Northwick Park Hospital for an hour or so in the next few months. Would you be interested in coming along and helping? We can cover the cost of your travel and provide refreshments

You would be helping us make sure our research is designed in a way that patients can understand and suits their needs and can include as many people as possible

Thank you!



Inwh-tr.cardiacresearch@nhs.net



0208 869 2547/8



www.cardiac-research.org



www.givey.com/nphcardiac

