MY LAB

# A HUB-AND-SPOKE NETWORK

Consultant Clinical Biochemist **Dr Allison Chipchase** gives a guided tour of the Eastern Pathology Alliance laboratories.

The Eastern Pathology Alliance (EPA) is a hub-and-spoke network of the hub – Norfolk and Norwich University Hospital (NNUH) – and the spokes – James Paget University Hospital (JPUH), and the Queen Elizabeth Hospital King's Lynn (QEH). We provide pathology services to a population of about one million people. The service comprises clinical biochemistry, toxicology, immunology, endocrinology, haematology, blood transfusion, microbiology and molecular genetics, collectively known as "Laboratory Medicine". The NNUH hub is responsible for the delivery of all community work for the Norfolk Integrated Care System (ICS) and delivery of the JPUH and QEH "cold" work – toxicology, endocrinology and immunology. EPA provides one of the SupraRegional Assay and Advice Services (SAAS) for calcium and bone metabolism markers, providing specialist analyses to the UK and Europe. In addition, we provide antenatal screening services to clinics and communities within Norfolk.

The EPA trisomy screening laboratory provides first-trimester combined screening for Norfolk. We process approximately 8000 samples per year and are ISO 15189 accredited. Due to declining birth rates, and the lower numbers of screens required in Norfolk, we formed a first-trimester network, in 2020, with Addenbrooke's screening laboratory – becoming the Cambridge and Norfolk and Norwich (CaNN) network.

Our screening team includes administrator support, pre-registration biomedical scientists, qualified biomedical scientists (working towards their specialist portfolio assessment), senior biomedical scientists and clinical scientists (including the consultant service lead). Our team is multi-skilled and is also responsible for delivery of our Norfolk-wide faecal immunochemical test (FIT) service, which is used in the risk assessment of suspected colorectal cancer, for providing tumour marker, steroid hormone, and peptide hormone analyses, markers of congestive heart failure, and CSF electrophoresis for oligoclonal bands analysis.

Our laboratory utilises the PerkinElmer AutoDELFIA analyser to process our samples for free β-HCG and PAPP-A and LifeCycle software to generate our reports. We are currently undertaking the process of upgrading our software to the latest version, which will enable us to give electronic and remote access to results for community and trust-based midwifery.

This year, working in partnership with our antenatal clinic colleagues, we have implemented an electronic requesting system for our screening samples. This has resulted in a significant reduction in "missing information" on the request forms we receive. Recording and monitoring missing information is an important key performance indicator in trisomy screening, and a problem that antenatal clinics are required to manage proactively.

EPA actively encourages staff development at all career stages. EPA Laboratory Medicine is an IBMS-accredited training laboratory and we have a number of staff completing the Certificate of Competence, Specialist Portfolio and Certificates of Expert Practice. We support individuals from other biology-related and chemistry-related specialisms who wish to change career and complete the Certificate of Competence by Equivalence.

We support training from NVQ to PhD and have recently introduced a Level 6 Apprenticeship for Biomedical Scientist training, in partnership with the University of East Anglia. We are active in clinical scientist training, with one STP and two HSST trainees, and have the clinical biochemistry trainee's representative and the regional tutor working in our trisomy screening service. CPD for all staff is supported by talks on specialist portfolio topics and interesting cases, and we have harnessed the positive impact of Microsoft Teams by recording these, allowing access when convenient. BMS