

West Midlands to digitally transform cancer diagnosis across 17 trusts following digital pathology go-live with Sectra

NHS patients throughout the West Midlands are to benefit from a digital pathology programme, designed to help reduce cancer backlogs, transform services, and improve the speed and accuracy of cancer diagnosis.

As one of the largest digital pathology programmes in Europe, the West Midlands Cancer Alliance initiative covers a population of 5.8 million people across four NHS pathology networks and 17 NHS trusts.

Delivered in partnership with medical imaging technology provider Sectra, the programme will help to tackle cancer backlogs by providing pathologists with the digital tools needed to better collaborate, share expertise and capacity, prioritise urgent cases and manage growing demand across the entire region.

The work signals the biggest change for the region's pathology services in more than a century. Technical go-live is now complete, meaning pathologists will start the transition from using microscopes and glass slides, to having instant access to high resolution digital images of tissues for patients across a large geographical area.

Professor Neil Anderson, NHS Midlands regional pathology clinical lead and chief scientist at University Hospitals Coventry and Warwickshire NHS Trust, said: "This is one of the most significant events in the last century around how our pathologists work and how that could lead to cancer pathway improvement. The earlier you can detect cancer, there is the potential for better the outcomes for patients. This technology speeds up the process and reporting through the Pathology Departments, but also allows teams to work between hospitals enabling them to report on images from anywhere in the region which will support faster, better cancer diagnosis.

"Working on the same platform from Sectra, we will be able to more easily share second opinions, without the need to package and transport slides across different laboratories, which can cause substantial delay. And our new digital platform will help us to explore AI to rapidly triage patients.

"Once patients are diagnosed, multi-disciplinary teams will have easier access to important information to help them manage patient care. All of this will help us to tackle backlogs in cancer care and make a big difference for our patients and the future of the profession."

The programme has seen the deployment of a picture archiving and communication system, or PACS, across the region's pathology networks. This has been provided by Sectra following contract signing last year.

Sometimes referred to as an enterprise imaging solution, the PACS allows healthcare professionals to access, view and analyse diagnostic images with a variety of tools, and to collaborate in real-time with colleagues as they report on those images, regardless of their location. This means pathologists can more easily work together at a distance, or at home without the need to transport physical slides. The PACS has been used by NHS radiologists for years and is now helping to transform pathology services at a time when hundreds of millions of pounds is being invested by the government into modernising diagnostics.

Phil Williams, NHS England's head of digital transformation for the Midlands, said: "The significance and scale of this programme is enormous. Bringing four pathology networks together on one platform allows for mutual support and image sharing throughout a huge geographical area, where

there are multiple trauma centres, millions of patients and increasingly in-demand pathology services. The technology we have deployed is an enabler for sharing reporting capacity across the West Midlands – giving us the tools on which we can accelerate strategic long term service transformation that is already underway to allow NHS services and professionals to work together around the needs of patients.

“Our programme, which uses private cloud, gives us the scalability and flexibility we need. The platform is also based on standards, allowing it to interoperate with other NHS systems and enabling us to take data out of silos, opening new possibilities to inform potentially life-saving research.

“Deploying the platform at this scale will also allow us to leverage AI on an equitable and effective basis – with the ability to trial emerging applications in one location and share learnings regionwide.”

Dr Kelvin Robson, a consultant cellular pathologist for Black Country Pathology Service, said digitising pathology would help to improve workflow, outcomes and patient experience. He said: “We have the potential to introduce new capabilities to flag urgent cases, and to understand what needs to be done, where and by which specialist. AI applications in the market can be introduced through the PACS that could allow us to quickly screen out the majority of patients who are benign, to be able to reassure those patients, and to focus our attention where it is most needed. Flexible working will also help us to recruit and retain staff that don’t need to be physically on site.”

The four pathology networks that have completed deployment of the PACS are:

Black Country Pathology Service – covering The Dudley Group NHS Foundation Trust, The Royal Wolverhampton Trust, Sandwell and West Birmingham NHS Trust, and Walsall Healthcare NHS Trust.

Birmingham and Solihull – covering Birmingham Women’s and Children’s NHS Foundation Trust, University Hospitals Birmingham NHS Foundation Trust, and The Royal Orthopaedic Hospital NHS Foundation Trust.

South Midlands Pathology – covering University Hospitals Coventry and Warwickshire NHS Trust, South Warwickshire University NHS Foundation Trust, George Eliot Hospital NHS Trust, Wye Valley NHS Trust, and Worcestershire Acute Hospitals NHS Trust.

North Midlands, South Cheshire, Shropshire, Telford and Wrekin – covering University Hospitals of North Midlands NHS Trust, The Robert Jones and Agnes Hunt Orthopaedic Hospital NHS Foundation Trust, The Shrewsbury and Telford Hospital NHS Trust, Mid Cheshire Hospitals NHS Foundation Trust, and East Cheshire NHS Trust.

Jane Rendall, UK managing director for Sectra, said: “Delivering a project at this scale is a remarkable achievement that brings tremendous opportunities for how care is delivered for cancer patients and others. As the NHS continues to recover from Covid-19, new ways of delivering services to identify patients sooner and on the right pathway as quickly as possible are essential. Pathology modernisation is key. Deploying technology to help is only a small part of making this work – and I look forward to seeing pathologists, other healthcare professionals and patients in the West Midlands benefit from the work being done to innovate in an essential part of patient care.”

ENDS

Notes to editors

About the West Midlands Cancer Alliance

The West Midlands Cancer Alliance works with commissioners and providers to improve the delivery of cancer services across the West Midlands to ensure patients get the highest standard of care.

Funded by NHS England, WMCA is a collaborative of clinical, patient and other leaders, working together to reduce variation and improve outcomes and patient experience, by driving innovation and improvement at scale and at pace across its constituent organisations.

With a population of 5.8 million people in the West Midlands and 600 cancer cases diagnosed per 100,000 people every year, the work of the WMCA is vital.

For more information please visit <https://wmcanceralliance.nhs.uk/>

About Sectra

With more than 30 years of innovation and approaching 2,000 installations worldwide, Sectra is a leading global provider of imaging IT solutions that support healthcare in achieving patient-centric care. Sectra offers an enterprise imaging solution that provides a unified strategy for all imaging needs while lowering operational costs. The scalable and modular solution, with a VNA at its core, allows healthcare providers to grow from ology to ology and from enterprise to enterprise. Visit Sectra's website to read more about Sectra and why it's top-ranked in '[Best in KLAS](#)'.