



# BD UK Diagnostic Strategy

From Policy to Implementation - Executive Summary



## Diagnostic transformation – a path forward

BD has a long commitment to supporting health systems around the globe and being a partner in the journey of reform and transformation. Better and broader use of diagnostic tools is at the frontier of that process, and key to confronting some of the wider demographic and structural challenges that all health systems are grappling with.

We welcome the recent recognition from the Government of the role of diagnostics in supporting efforts to reduce the waiting lists and improve urgent and emergency care services. As well as increasing access to testing, action is needed to improve the timeliness and accuracy of testing results and make better use of the investment in pathology services.

Our first White Paper, UK Diagnostics Industrial Strategy: The route to a world-leading diagnostics sector identified eight key areas for national action to improve the delivery of diagnostic services, particularly pathology services. We have now developed a series of recommendations at regional and local level covering:

- Identifying the value of diagnostic services
- Putting patients at the centre of diagnostics
- Making better use of existing resources
- Focusing on decision-making and procurement.

## Identifying the value of diagnostic services

Historically, pathology services have been under-recognised and under-funded and so increased funding for pathology is extremely welcome. It is important that ICBs recognise the additional value that investment in these services can bring.

Diagnostic services span both primary and secondary care, so the opportunities for delivering additional value are wide-ranging and can be felt throughout the system. For example, respiratory infections are a major driver of emergency attendances and hospital admissions in winter. NHS England's guidance on the development of Acute Respiratory Infection hubs to make better use of community-based diagnostics is welcome. However, there is variation in adoption of these approaches and ICBs need to support local decision-makers to prioritise investment in activity, such as community-based testing, that will have the biggest impact for patients and services

Similarly, blood stream infections place a major burden on health services and are associated with poor outcomes for patients. NHS England has issued guidance on optimising blood culture pathways to accelerate the delivery of accurate results. Local NHS organisations can design their own local pathways so ICBs need to provide leadership to ensure that optimised pathways are developed.

## Putting patients at the centre of diagnostics

There are opportunities across the NHS to redraw diagnostic testing pathways to put patients at the centre.

### Primary prevention

The NHS already delivers a national cervical cancer screening programme but while the UK's screening coverage is relatively high compared with many other countries it has been declining for around 20 years<sup>1</sup>. Technology now exists to deliver accurate results based on self-sampling for Human Papillomavirus (HPV) which causes almost all cervical cancers. Enabling women in the UK to take their own sample at home and post it to a laboratory could significantly increase uptake, leading to even more people at risk of cervical cancer being spotted early as well as reducing pressure on GP practices for screening appointments.

### Decentralising testing

At each stage in the testing pathway there can be opportunities to de-centralise testing to a range of places and settings. By considering how to make testing more convenient for patients, services can move to a point of need approach to testing. In addition, ICBs can consider where the analysis takes place as a way of delivering efficiencies, for example a single laboratory could be the destination for postal samples taken across multiple locations, or analysis in local laboratories may be the best option for particular tests.

<sup>1</sup> Cancer Research UK, *New insights on self-sampling for cervical cancer screening*, 27th April 2022

## Point of care testing

The new technologies being developed in testing and ICBs' strategic approach to commissioning support a move to 'point of need' testing. This could widen patients' access to a range of testing by delivering it where they are and offering multiple tests in one location. This could offer benefits for those facing health inequalities, such as people with severe mental health conditions who are at greater risk of conditions like diabetes but may not access primary care services, testing could instead be offered in services they already access.

## Home testing

It is possible that more blood testing could be conducted at home. Several clinical trials have demonstrated the potential of capillary blood testing based on self-sampling and postal services as part of the management of long-term conditions such as diabetes. There is work to do to manage the funding, capacity, and governance requirements of these changes but patient preference is likely to push care in this direction so ICBs need to take action.

## Making better use of existing resources

For several years there has been a focus on creating a more efficient and effective structure for pathology services across the country. Working with the pathology networks, ICBs have an opportunity now to maximise the resources available to better support diagnostic services.

### Consolidating capacity

There is an opportunity to consider the distribution of capacity across the 29 pathology networks. Consolidating capacity could support higher throughput and maximise the volume of tests performed, increasing quality and value for money. Supporting fewer centres with appropriate investment from across the network would enable them to invest in the latest equipment and technology, delivering cutting edge services and releasing the benefits of specialisation, automation, and higher productivity.

### Making better use of digital pathology

The benefits to patients and the NHS of digital pathology are significant and there needs to be a concerted effort to ensure that the investment is in place to support this. As more members of staff work flexibly and/or remotely, using digital pathology can help to maximise the staff time and capacity that can be deployed. Similarly, innovations in machine learning and artificial intelligence can support improvements in diagnostic services. For example, algorithms can help to identify normal samples from a cohort, enabling the pathology staff to focus their attention on samples which show abnormalities or are inconclusive.

### Supporting the workforce

Workforce challenges across the NHS have an impact on patients' access to diagnostics, including within pathology services. One opportunity is to consider the skill mix of those involved in analysing and reporting results. Pathology networks need to ensure that tasks are carried out by the most appropriate person and that roles which are no longer required – for example due to digitalisation – are not maintained unnecessarily.

## Focusing on decision-making and procurement

### Standards setting and reporting

There remains variation across the delivery and output of diagnostics services. The Pathology Quality Assurance Dashboard (PQAD) has been developed to provide visibility of performance at a national level. However, data collection and inputting in the system remains inconsistent and of variable quality. Making data collection and reporting mandatory would have a significant impact on the usability of the data. The diagnostic activity and waiting time data that are currently collected and reported by the NHS do not include details of any in vitro diagnostic tests, which needs to be addressed. There are opportunities to include metrics around testing for infectious disease and anti-microbial resistance which would make a difference to both patients and the NHS.

## Improving procurement

As part of the consolidation of pathology capacity, consideration needs to be given to how to streamline and standardise pathology procurement processes to speed up the diffusion of innovation and new technology throughout the system. Both within and between services there can be approaches that lead to siloed budgets – with savings not being realised because they are accrued in another part of the system. Those making decisions about spending on testing and pathology infrastructure have an opportunity to work in partnership across commissioners, providers and industry taking a view across primary, secondary, community, and social care to make the most of their investment.

## Piloting

It is right that technology is tested before the NHS invests large sums of money in adopting innovation. However, multiple pilots are often conducted, rather than a single pilot in one area providing a proof of concept that can be learnt from elsewhere. The experience of the COVID-19 pandemic, where new technologies were trialled and then rolled out quickly across the country needs to be the basis for our approach to uptake in the future.

## Summary of recommendations

### Identifying the value of diagnostics services

- ICBs need to work with pathology leaders to identify where investment in delivering best practice, including additional infrastructure or capacity, will have an impact across the local healthcare budget and support delivery of high-quality care.
- ICBs should develop governance frameworks that allow services to use the pathway expertise of consultant pathologists to enable patients to receive their results quickly and have a smooth transition to the next stage of their treatment.

### Putting patients at the centre of diagnostics

- ICBs should ensure that data from pathology laboratories is captured and used to inform the understanding of the local healthcare need to support planning of local services, including diagnostics.
- NHS England should work with ICBs to identify the training needs for delivering point of need testing and the governance arrangements needed to underpin this approach.
- ICBs should take a holistic approach to redesigning pathways to support wider access to testing in existing services and more routes into treatment pathways.
- ICBs should explore options to expand the use of home sampling for patients who require regular monitoring to identify where it can benefit patients and improve service delivery.
- NHS England should work in partnership with ICBs and PCNs to identify an appropriate way to support primary care to deliver an increase in home testing.
- ICBs should work with pathology networks to ensure that considerations about sample analysis and pathology capacity are part of diagnostic testing pathway redesign.
- NHS England and ICBs should work with pathology networks to identify any new governance approaches needed to support the roll out of redesigned testing pathways.

### Making better use of existing resources

- Pathology networks and ICBs need to establish a network of consolidated centres to increase volumes and drive efficiency and value for money from high complexity tests.
- The experience of NHS Test and Trace should be used to support ICBs to deliver improved local logistics for testing.
- ICBs and pathology networks need to accelerate efforts to deliver digital pathology, including improving IT infrastructure such as LIMs, and invest in machine learning and AI that can support better prioritisation of resources.
- Pathology networks should develop competency-based approaches to recruitment and staffing to ensure that tasks are completed by the most appropriate professional and that mixed teams can work effectively together.

## Focusing on decision-making and procurement

- NHS England should make data collection and reporting mandatory for all pathology service providers and explore additional metrics that would improve quality of care.
- ICBs need to work across their whole health and care economy to ensure that siloed budgeting within and between services is not preventing investment in new technologies that could improve care and deliver savings.
- NHS England needs to work with ICBs to ensure that lessons from local pilots on introducing new technologies are spread widely and there are clear directions for the uptake of innovation where the case for investment has been demonstrated.