
A graphic of a globe composed of white geometric shapes on a dark blue background with small white stars.

Unprecedented Challenge Met with Rapid Development and Deployment of Novel Best Practices at Warwick Medical School and UHW NHS Trust

UHCW NHS Trust & Warwick Medical School

The UNIVANTS logo, featuring a stylized 'U' and 'V' icon above the text "UNIVANTS OF HEALTHCARE EXCELLENCE".

The COVID-19 pandemic presented substantial challenges to the world, including unprecedented demands on healthcare provision, all while “everyday” and urgent clinical care needs continued. The severe, and poorly understood novel corona virus upon early phases, coupled with the continued needs across the spectrum of healthcare, required strong, decisive health care leadership to devise novel strategies to help deal with the pandemic. Healthcare teams that draw upon diverse professions and collaborate in novel ways often provide the most robust leadership in healthcare. These teams challenge the status quo, formulating and acting in new ways to quickly develop and implement the needed infrastructure to address emerging unmet needs and translate innovation to clinical practice.



From left to right: Neil Anderson, Harpal Randeva, Asad Ali, Dimitris Grammatopoulos, Lisa Berry



The Coventry and Warwickshire Pathology Services clinical diagnostics department (CWPS) led one such team for the University Hospitals Coventry and Warwickshire NHS Trust (UHCW) in response to the unique challenges of the COVID-19 pandemic. This multidisciplinary team included Endocrinology, Virology, Pathology, Pulmonology, and Molecular Medicine representatives. Their team united to develop and implement transformative multi-faceted scientific and clinical novel best practices to meet patients’ urgent clinical care needs. Facets of their best practices included establishing a new dedicated “Pillar 1” (swab testing for those with clinical needs and health care workers) laboratory within the hospital. A second facet included coordination with public health teams to integrate the Pillar 1 testing with “Pillar 2” testing (swab testing for the wider population, as set out in government guidance).

An additional and essential facet of their teams’ efforts was the introduction of a biomarker testing panel to inform decision-making in their new COVID-19 clinical care pathway. The initiative also investigated transmission patterns of local outbreaks and supported the NHS Test and Tracing Technical Validation efforts to validate new sciences and technologies for effective screening of variants of concern (VOC). Finally, this integrated clinical care team developed a COVID-19 biorepository for housing and archiving COVID samples to enable longitudinal studies on COVID-19 and its sequelae.

Through their collaboration and time-sensitive leadership, this integrated clinical care team has achieved impressive results for stakeholders, including payors, health systems, Clinicians, and patients.

Using the in-house PCR variant of concern (VOC) service, over 330 admissions received an evaluation for possible reinfection based on test findings. This service enabled better disease characterization and monitored variant admission trends in line with national policies—a better understanding of the VOCs and disease burden enhanced clinicians’ confidence in their care of patients. Further, with result reporting for emergency patients reduced from eight hours to 45 minutes patients have experienced improvement in their safety, which is not small feat during a pandemic. In one example, a patient who had suffered a stroke was able to be transferred directly to the stroke ward without having to go to isolation first due to a quick negative COVID result in the Emergency Department, thus enabling even more timely stroke care.

In recognition of their impressive measurable improvements to healthcare, the multidisciplinary COVID response team at the University Hospitals Coventry and Warwickshire NHS Trust received recognition of distinction from the prestigious 2021 UNIVANTS of Healthcare Excellence Awards program.

THREE KEY TAKEAWAYS:

- Strong leadership teams of diverse health disciplines can respond to emergent conditions to quickly meet changes in patient needs.
- Careful and thoughtful rapid translation of proven novel science into clinical care pathways can enable enhanced care in public health emergencies.
- Local best practices can significantly contribute to national health strategy, leading to a worldwide positive impact.

