

Vital Australian health agency improves efficiencies leading to a mobile workforce and a reduction in blood being wasted unnecessarily



National Blood Authority stems AUD\$10 million blood wastage with Nutanix

CHALLENGE

The National Blood Authority (NBA) is responsible for the delivery of four million units of blood and blood products – valued at \$1.2 billion – every year. It manages this monumental process by using a variety of critical applications, such as its primary blood management system, BloodNet, as well as the Australian Bleeding Disorders Registry and BloodSTAR, Australia’s immunoglobulin management system. NBA relies on these applications to access up-to-date clinical, medical and patient information in real-time so that blood can be delivered punctually to the Australians who need it most.

NBA previously used a traditional thick client environment to provide desktop services to staff. Over time, the environment suffered performance degradation and became increasingly inhibitive, especially when it came to adapting to an evolving IT landscape. In the instance that NBA’s staff were unable to access their desktops even briefly, it risked the integrity of the blood supply chain whilst ICT engineers spent hours restoring full functionality. Moreover, the environment prevented NBA from providing staff with full access to applications outside the office. Consequently, frequently-travelling staff were forced to spend hours – and even weeks – preparing documents for out-of-office trips only to find the data was out of date by the time they arrived at their destinations.

SOLUTION

NBA selected Nutanix following consultation from Canberra-based ICT services provider, Qirx. NBA initially engaged Qirx to design a virtual desktop infrastructure (VDI) solution so that staff could work at home, in laboratories, at remote clinics and while on the road with the same productivity as within the office.

Qirx designed a solution based on VMware vSphere and Horizon View to facilitate remote desktop, both on-site using zero clients, and remotely using PCOIP and HTML blast.

While NBA explored a number of options – including a new SAN – to support this environment, Qirx quickly recommended the Nutanix Enterprise Cloud Platform because it converges compute, storage, virtualisation and unstructured data management for high application performance and reliability. The VDI now runs on clusters of Nutanix NX1050 appliances.

By consolidating the NBA data centre, it is now simple, flexible and scalable, with any potential failures automatically resolved by the in-built software before they can impact the business.

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– Peter O’Halloran,
Chief Information Officer,
National Blood Authority

RESULTS

The Nutanix Enterprise Cloud Platform has enabled NBA to empower its employees with access to the agency's systems anytime, anywhere via VDI. With resources readily-available and performing as intended at all times, NBA has enhanced its service delivery as the most up-to-date inventory data and can be used by staff on demand to improve the administration and delivery of blood.

On average, staff are saving 34 minutes per week which would have previously been spent waiting for log-ins – add to that all the time that was wasted waiting for data to generate as a result of insufficient compute power. The savings added up pretty quickly, particularly with more than 30 contractors on site charging \$100 per hour. Ultimately, NBA saw a complete return on investment within the first five months of having Nutanix in place. By removing these delays, there has been a significant increase in process efficiencies, and most importantly, less blood wasted, more lives saved.

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In addition to better outcomes for the healthcare sector, the Nutanix infrastructure has led to significant cost savings for the NBA. Alongside the productivity gains and reduced document preparation and aggregation times, the NBA is also saving on third party services. O'Halloran said that NBA achieved a 100 per cent return on investment (ROI) within the first five months of its implementation.

Simplified Management with Nutanix Prism

NBA manages its hyperconverged data centre using Nutanix's one-click enterprise management console, Prism, which has eliminated the complex and time-consuming maintenance NBA's former environment demanded.

"While the Nutanix platform essentially takes care of itself, any time our IT team does need to make changes to the configuration or spin up more VMs, Prism provides an easy-to-use, clean interface that gives us everything we need in one intelligent snapshot," O'Halloran said. "That means our IT team spends less time maintaining the environment, and more time improving our applications and services so that employees can deliver blood even more efficiently."

The modular building-block design of the Nutanix platform enables NBA to scale out its Nutanix environment as required. As the agency continues to expand, it can simply add more nodes to match its increased requirements. NBA started with four appliances, and immediately introduced another four for a second site.



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Nutanix makes infrastructure invisible, elevating IT to focus on the applications and services that power their business. The Nutanix enterprise cloud platform leverages web-scale engineering and consumer-grade design to natively converge compute, virtualization and storage into a resilient, software-defined solution with rich machine intelligence. The result is predictable performance, cloud-like infrastructure consumption, robust security, and seamless application mobility for a broad range of enterprise applications.

Learn more at www.nutanix.com or follow us on [Twitter@nutanix](https://twitter.com/nutanix).

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COMPANY

The National Blood Authority (NBA) is a statutory agency within the Australian Government Health portfolio. Its role is to manage and coordinate the adequate, safe, secure and affordable supply of blood, blood products and services on behalf of the Australian Federal and State governments. NBA achieves this through a range of procurement contracts with parties including the Red Cross and pharmaceutical companies.

INDUSTRY

Government and healthcare

BUSINESS NEEDS

A reliable yet simple data centre to ensure application up-time so National Blood Authority could continue to deliver blood to Australians accurately and on time.

SOLUTION

- › Nutanix Enterprise Cloud Platform NX-1050
- › Nutanix Prism management solution

BENEFITS

- › Consolidated data centre into the Nutanix Enterprise Cloud Platform for simplicity and reliability, resulting in massive blood savings and cost reduction.
- › Enabled critical applications anytime, anywhere, stemming potential blood wastage of up to \$10 million.
- › Reduced maintenance time by approximately 50% by leveraging the Prism interface.
- › Achieved 100% ROI within the first 5 months of its implementation.