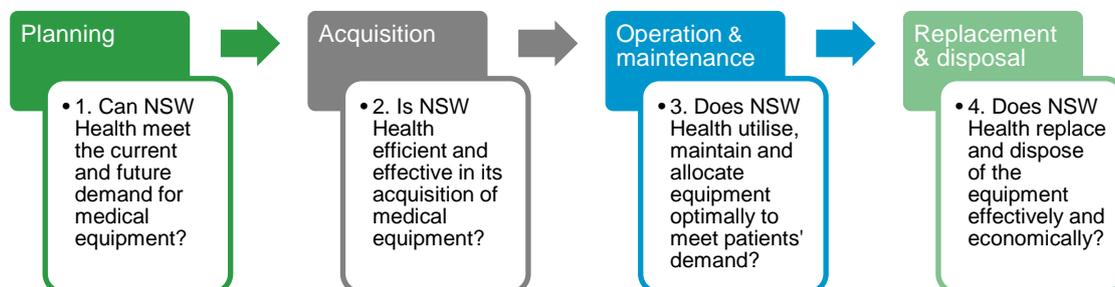


Appendix 2: About the Audit

Objective and focus

This audit assessed how well NSW public hospitals manage medical equipment to meet patients' demand. The audit criteria are based on an asset life-cycle model, as shown below.



This audit has two parts:

- The first part of the audit covers the various stages of asset life cycle for one type of high-value equipment, the Positron Emission Tomography and Computed Tomography (PET-CT) scanners.
- The second part of the audit was a data-based audit of a sample of commonly used biomedical equipment. The audit sample was selected using NSW Health's Fixed Asset Register and hospitals' legacy information systems. The approximate original value of the audit sample for each hospital is \$500,000.

We examined the following five public hospitals:

- Lismore Base Hospital – Northern NSW LHD
- Liverpool Hospital – South Western Sydney LHD
- Nepean Hospital – Nepean Blue Mountains LHD
- Royal Prince Alfred Hospital – Sydney LHD
- Westmead Hospital – Western Sydney LHD.

We chose these hospitals to reflect a cross-section of inner-metropolitan, suburban, and regional populations. They are all large hospitals (Royal Prince Alfred, Westmead, Liverpool and Nepean Hospitals are 'principal referral hospitals', which are the largest type of hospital). Lismore Base Hospital is the only hospital outside the Newcastle-Sydney-Wollongong region to have a PET-CT scanner.

Audit exclusions

The audit did not examine:

- clinical reasons for using or not using medical equipment
- clinical outcomes as a result of using medical equipment
- the merits of Government policy objectives.

Audit methodology and approach

Our performance audit methodology is designed to satisfy Australian Audit Standards ASAE 3500 on performance auditing. The Standard requires the audit team to comply with relevant ethical requirements and plan and perform the audit to obtain reasonable assurance and draw a conclusion on the audit objective. Our processes have also been designed to comply with the auditing requirements specified in the *Public Finance and Audit Act 1983*.

Our audit approach included:

- Review and analysis of data and documents, policies and procedures
- Site visits of the Nuclear Medicine or Medical Imaging Department and the Biomedical Engineering Department of each hospital

- Interviews with key NSW Health personnel
- Advice from an external expert consultant.

Acknowledgements

We gratefully acknowledge the cooperation and assistance provided by the various agencies that are part of NSW Health:

- NSW Ministry of Health
- Lismore Base Hospital – Northern NSW LHD
- Liverpool Hospital – South Western Sydney LHD
- Nepean Hospital – Nepean Blue Mountains LHD
- Royal Prince Alfred Hospital – Sydney LHD
- Westmead Hospital – Western Sydney LHD.
- HealthShare
- NSW Biomedical Engineering Group (BMEG)
- eHealth.

Audit team

Xin Yin Ooi and Matthew Blunt conducted this performance audit. Michael Thistlethwaite, Andrew Hayne and Kathrina Lo provided oversight and quality assurance. The Audit Office engaged Shane Rendalls from Synergy Health & Business Collaborative to provide subject matter support for the PET-CT component of the audit.

Audit cost

Including staff costs, consultancy, travel and overheads, the estimated cost of the audit is \$352,000.