
Near Infra-Red Fluorescence

Initiative Type

Technology

Status

Deliver

Added

01 September 2017

Last updated

27 September 2018

URL

<https://clinicaexcellence.qld.gov.au/improvement-exchange/fluorescence>

Summary

Real-time intraoperative near-infrared fluorescence (NIRF) imaging is a technique used for sentinel lymph node (SLN) detection. By using a NIR fluorescent dye such as indocyanin green (ICG), and a sensitive fluorescence camera system, SLN's can be located intra-operatively for examination. Although this technology has been employed for breast, skin and colorectal cancers, in this instance it will be investigated for endometrial cancer. Where SLN's are positive for metastases, the patient

will undergo adjuvant radiation and chemotherapy but with reduced morbidity as a full lymph node dissection has not been performed. If the SLN is negative, patients can be spared further therapy.

Key dates

Jan 2018

Dec 2018

Implementation sites

Royal Brisbane and Women's Hospital

Partnerships

Healthcare Improvement Unit

Key Contacts

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Aim

Provides an opportunity to pilot and evaluate new technologies within 'real world' clinical settings in the Queensland context.

Benefits

The potential benefits of this technology includes:

- NIRF with ICG will assist in mapping the SNL location.
- NIRF with ICG should reduce the rate of adjuvant radiation and/or chemotherapy given to patients.
- NIRF with ICG is feasible and safe and should replace full lymph node dissection.
- NIRF with ICG will reduce the number of full pelvic lymphadenectomies required.
- NIRF with ICG should reduce surgical morbidity for the patient and also reduce morbidity associated with lymphoedema.
- NIRF with ICG should be tolerated by the patient with very low risk of side effects.

Background

This technology was funded through the New Technology Funding and Evaluation Program (NTFEP). The NTFEP funds the introduction and evaluation of new technologies that:

- Are safe and effective
- Provide better health outcomes
- Provide value for money
- Provide greater access to care.

The evaluation findings will inform recommendations regarding the future use and/or investment of the technology within Queensland.

Evaluation and Results

This technology is currently under evaluation and results will be published on completion.

Resources

[Technology evaluation summary](#)

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