Return to the Operating Room for Re-excision of Previous Microscopically Negative Margins in Invasive Breast Cancer Patients Undergoing Breast Conserving Therapy

National Quality Strategy Domain

- Clinical Care

Measure Type

- Outcome
- Traditional
- Proportional

Description

The percent of patients with a known diagnosis of invasive breast cancer undergoing lumpectomy (partial mastectomy) breast cancer operations who obtained microscopically negative margins at the first operation and did not return for additional operations in order to excise additional tissue for margin clearance.

Numerator

The number of patients aged 18 and older undergoing breast cancer operations who had invasive breast cancer diagnosed preoperatively by a minimally invasive biopsy, underwent partial mastectomy that obtained microscopically negative margins, and who were not returned to the operating room specifically to excise additional tissue for wider margins.

Definition

Minimally invasive biopsy methods — Includes fine needle aspiration, percutaneous core needle biopsy, percutaneous automated vacuum assisted rotating biopsy device, skin biopsy, skin shave or punch biopsy.

Denominator

The number of patients aged 18 years and older with invasive cancer on date of encounter undergoing initial lumpectomy (partial mastectomy) breast cancer operations.
Denominator Exceptions

Documentation of reason(s) for returning to the operating room for additional breast tissue at the margin (i.e., patients not receiving post-operative adjuvant radiation therapy after partial mastectomy, radiologic or pathologic evidence of additional disease at or near the margin after initial operation, imaging or pathologic evidence of disease elsewhere in the breast at separate site, etc).

Performance Not Met

The patient has microscopically negative margins on initial partial mastectomy, and returns to the operating room to obtain additional tissue for margin(s) clearance in patients with a diagnosis of invasive breast cancer.

Rationale

Obtaining microscopically negative margins at the time of partial mastectomy in patients with a preoperative diagnosis of invasive breast cancer decreases the risk of recurrence and optimizes oncologic outcomes.

Studies do not reveal additional benefit with anything more than microscopically negative margins in invasive breast cancer patients undergoing adjuvant whole breast radiation therapy.

Additional operations to obtain more negative margins can diminish cosmetic outcomes and increase medical expenses without patient benefit. A consensus statement (Ann Surg Oncol. 2014 Mar;21(3):704-16. doi: 10.1245/s10434-014-3481-4) regarding the management of margins in the setting of a diagnosis of invasive breast cancer supports this rationale.

Clinical Recommendation Statements

A goal of breast cancer care is to minimize the number of operations a patient requires in order to optimize their oncologic outcomes and minimize their local recurrence. Patients with a known diagnosis of invasive breast cancer can choose to undergo a partial mastectomy with adjuvant whole breast radiation—known as breast conserving surgery. By meta-analysis, the rate of in breast tumor recurrence after partial mastectomy and radiation is not improved when margins wider than ink-negative are obtained. Microscopically negative margins have been found to have acceptable rates of local recurrence. Excising additional tissue with a second operation, after initially negative margins, has not been found to benefit patients, and increases the risk of a poor cosmetic result as well as the risk of infection. Some patients may need margins that are more than microscopically negative if they choose not to receive standard whole breast radiation or are identified to have residual disease on imaging or biopsy after an initial partial mastectomy with negative margins.
**Date Endorsed**

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**References**
