


Author response: advancing targeted axillary dissection in node-positive breast cancer: insights from pooled analyses and systematic review

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Dear Editor

We appreciate the invitation to respond to the correspondence by Wazir *et al.* and congratulate the authors with their pooled analysis of four studies on the use of radar (electromagnetic) reflector localization in targeted axillary dissection (TAD).

In our systematic review on studies describing experiences with TAD, we at that time reported a pooled identification rate of 100% for radar reflectors¹. The work by Wazir *et al.* is very valuable as this further aids in trying to identify the most optimal staging procedure. In their analysis, which included two more studies (one was excluded from our review as fewer than 25 patients were available for analysis, the other was recently published), the pooled identification rate was also found to be 100%. Wazir *et al.* additionally reported on deployment and localization rate, which were also excellent (99.6–100%). They furthermore reported that performing only excision of the marked lymph node (MLNB) or only sentinel lymph node biopsy (SLNB) would result in understaging of the axilla.

We agree with the authors on the importance of MLNB for axillary staging. Only a few studies formally assessed diagnostic accuracy of TAD or MLNB only (by performing axillary lymph node dissection routinely in all patients as the gold standard) in patients with pathologically confirmed clinically node-positive

breast cancer. In the RISAS trial², the false negative rate (FNR) of TAD as well as the FNR of the MLNB only and SLNB only were reported on and compared. With accumulating evidence from the RISAS trial together with other studies on accuracy being highest for TAD and lowest for SLNB only, we purposefully chose to focus on the technical details of TAD in our systematic review. As the authors also mentioned, study heterogeneity and study limitations hinder us in determining the most optimal procedure, which indeed underlines the need for high-quality studies in which different TAD procedures are being compared.

References

1. de Wild SR, Koppert LB, van Nijnatten TJA, Kooreman LFS, Vrancken Peeters M, Smidt ML *et al.* Systematic review of targeted axillary dissection in node-positive breast cancer treated with neoadjuvant systemic therapy: variation in type of marker and timing of placement. *Br J Surg* 2024;**111**:znae071
2. Simons JM, van Nijnatten TJA, van der Pol CC, van Diest PJ, Jager A, van Klaveren D *et al.* Diagnostic accuracy of radioactive iodine seed placement in the axilla with sentinel lymph node biopsy after neoadjuvant chemotherapy in node-positive breast cancer. *JAMA Surg* 2022;**157**:991–999

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