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Sentinel node mapping after previous surgical manipulation of the breast: comment on Marrazzo et al.

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To the Editor,

We read with great interest the article of Marrazzo *et al* in the recent issue of European Journal of Oncology on the accuracy of sentinel node mapping in patients with previous biopsy of the breast lesions. They reported 100% sentinel node detection rate and no axillary recurrence in the patients with previous surgical biopsy of the breast lesions and concluded that sentinel node mapping is safe in this group of patients (1). We totally agree with Marrazzo *et al* and in our opinion the bulk of evidence in the literature is concordant with their conclusion.

Several studies also showed that surgical manipulation of the breast lesions does not change detection or false negative rates of sentinel node mapping (2-5). In a systematic review published in 2012, Javan *et al* reported that pooled detection rates for patients with and without previous surgical biopsy were 91.3% and 92.8%. Pooled false negative rates were 12.3% and 9.9%. Odds ratio and risk difference of having false negative results were 1.4 and 0.02 respectively (6). They concluded that sentinel node mapping is safe and accurate in patients with previous surgical biopsy of the breast lesions.

Another study by Asadi *et al* evaluated the reproducibility of lymphoscintigraphy imaging before and after excisional biopsy of the breast lesions in 18 patients. In 16 cases, one sentinel node was detected in both lymphoscintigraphy images in the same location. Their results supported the notion that excisional biopsy of the breast lesions does not change the lymphatic drainage of the breast (7).

Nonetheless, excisional biopsy of the breast lesions can have their drawbacks. The edema and tissue changes induced by surgical manipulation of the breast can hamper the migrations of the lymphatic mapping material in the lymphatic vessels with resulting slower sentinel node detection. It seems that longer interval between breast lesion manipulation and sentinel node mapping can decrease the time of sentinel node visualization (8).

In our opinion, the study of Marrazzo *et al* is an important addition to the literature as they reported the axillary recurrence after sentinel node biopsy in patients with previous manipulation of the breast lesions. Marrazzo *et al* study shows again that contraindication of sentinel node biopsy in breast cancer patients is very limited (1, 9, 10) and we should not deprive the patient of this important modality.

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