

Letter to the Editor in Response to “Eliminating Preoperative Lymphoscintigraphy in Extremity Melanomas”

Sharanniyam Ragavan; Won Young Yoon; Deemesh Oudit, MBBS

Sir,

We read with great interest the paper by the authors from the Plastic and Reconstructive Surgery Section of the Yale University School of Medicine on the possibility of eliminating preoperative lymphoscintigraphy (POLSG) in extremity melanomas.¹ It was indeed pleasing to hear that the negative effects/costs associated with an additional procedure like a POLSG could possibly be eliminated for patients.

The authors based the elimination of POLSG on the minimal atypical drainage rates for extremity tumors in their cohort. Based on the current literature and the literature that was used by the authors themselves, however, we disagree and believe that these tumors do have relatively unpredictable drainage patterns, and POLSG remains necessary in all patients undergoing a sentinel lymph node biopsy.

Vucetić et al² concluded that, from their experience, POLSG is essential in the management of patients with malignant melanoma due to its sensitivity and inexpensiveness. This most likely stems from the high rate of anomalous drainage of 15.0% in a 201-patient cohort coupled with completely unpredictable drainage in 3% of patients. In Stadius Muller et al’s³ 348-patient cohort, particularly in the upper extremity, there was only 83% predictability of drainage to the ipsilateral axilla. The unknown nature of interval nodes in patients also need to be highlighted, with Menes et al⁴ reporting that significantly 9% of their 106 patients with a primary at the knee or distal to the knee had popliteal node drainage together with conventional groin drainage. These patients had varying patterns of drainage to the 2 nodal basins, with the groin nodes presenting either as first- or second-order sentinel nodes. Interestingly, the authors from the Sydney Melanoma Unit⁵ also report direct drainage from the forearm to interpectoral or supraclavicular/neck nodes with or without direct drainage to the axilla as well.

From the Christie NHS Foundation Trust and School of Medical Sciences, Faculty of Biology, Medicine and Health, University of Manchester, Manchester, United Kingdom.

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We do acknowledge that compared with the extremities, axial primaries do make up a large proportion of aberrant drainages, with Vucetić et al² reporting that axial primaries had drainage discordance with classical anatomical guidelines at a rate of 39% for head/neck and 23% for truncal lesions, with extremity tumors draining exclusively to 1 basin. Stadius Muller et al³ concluded that extremity primaries did have predictable drainage when compared to the much higher unpredictability rates of axial tumors, but both groups concluded that POLSG should remain a staple of the staging process.

It would be almost impossible to determine in which cases aberrant sentinel node drainage will present without POLSG. It is also likely that without POLSG, sentinel nodes may be missed, thereby directly affecting the staging investigation. Nodes draining to adjacent nodal basins identified by lymphoscintigraphy should also be harvested in the sentinel lymph node biopsy for accuracy of staging. We, therefore, strongly believe that there is a clear role for POLSG in cutaneous melanomas for accurate staging independent of anatomical location.

Sharanniyam Ragavan

School of Medical Sciences, Faculty of Biology, Medicine and Health
University of Manchester
Manchester
M13 9PL
United Kingdom

E-mail: sharanniyam.ragavan@student.manchester.ac.uk

DISCLOSURE

The authors have no financial interest to declare in relation to the content of this article.

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