Field cancerization: Looking to the future

To the Editor: We appreciate the review of our CME articles "Field cancerization: definition, epidemiology, risk factors, and outcomes" and "Field cancerization: treatment" by Morton and Muir and would like to address the authors' concerns. We agree that uncertainty remains when identifying, managing, and treating field cancerization (FC) and believe that our CME article not only served to inform the JAAD readership but also highlighted areas for further study.[1,2]

A variety of definitions for cutaneous FC have been previously suggested, ranging from subclinical atypia to clinical atypia with invasive disease.[1] We believe that the presence of invasive disease should not define FC. Although invasive cutaneous squamous cell carcinoma (CSCC) often precedes or coincides with FC, a prerequisite of the presence of invasive disease may exclude some patients. For example, solid organ transplant recipients frequently develop FC, which precedes the development of an invasive CSCC. By restricting the definition of FC to only those with invasive disease, high-risk patients who would benefit from early and aggressive treatment of FC would be excluded from the diagnosis of FC.

It is important to highlight the difference between chronic solar damage and FC. The cutaneous effects of chronic solar damage, including poikiloderma, rhytids, and lentigines, differ from FC, which is characterized by multifocal clinical atypia with confluent actinic keratoses (AKs) and squamous cell carcinomas in situ. We agree that discrete AKs do not meet the criteria for the diagnosis of FC, given the lack of confluence of lesions. This distinction between solar damage/discrete AKs and FC is vital for identifying the patients at risk for developing CSCC.

Morton and Muir noted their hesitation against instituting a broad definition of FC before establishing clear benefit. We feel that defining FC is a critical first step in its rigorous study, without which comparison of various treatment approaches and standardization of management is difficult. Without an accepted definition, including categories of severity, the inclusion criteria of clinical trials are difficult to define, given the variable risks associated with different treatment options. Importantly, the benefits of field treatment are clear. The treatment of AKs has been shown to reduce the risk of developing keratinocyte carcinomas and high degrees of actinic damage have been shown to negatively affect patients' quality of life.[3,4] An economic benefit has been shown as well, as the use of field treatment has been associated with reduced costs for patients at a risk of developing CSCCs.[5] However, making recommendations about how to incorporate these data into clinical practice is difficult without a working definition of FC. Treatment approaches, which vary from focal topical treatment to long-term systemic therapy, are likely to differ markedly by FC severity.

In conclusion, much work remains to validate the proposed definition and to determine the best treatment of FC.[1,2] We believe that a grading system that stratifies patients with FC will help identify those most likely to develop invasive disease and those who would benefit from aggressive treatment. We can design high-level clinical trials to determine optimal management of this disease entity only when patients with FC are identified and the level of disease is quantified.

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Funding sources: None.

IRB approval status: Not applicable.

Reprints not available from the author.

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Conflicts of interest

None disclosed.

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https://doi.org/10.1016/j.jaad.2021.02.077