



2012 Appropriate Use Criteria for Mohs Micrographic Surgery

The appropriate use criteria process synthesizes evidence-based medicine, clinical practice experience, and expert judgment. The American Academy of Dermatology in collaboration with the American College of Mohs Surgery, the American Society for Dermatologic Surgery Association, and the American Society for Mohs Surgery has developed appropriate use criteria for 270 scenarios for which Mohs micrographic surgery (MMS) is frequently considered based on tumor and patient characteristics. This document reflects the rating of appropriateness of MMS for each of these clinical scenarios by a ratings panel of 17 experts in a process based on the appropriateness method developed by the RAND Corp (Santa Monica, CA)/University of California Los Angeles (RAND/UCLA). *J Am Acad Dermatol* 2012;67:531-62.

At the conclusion of the rating process, consensus was reached for all 270 (100%) scenarios by the Ratings Panel, with 200 (74.07%) deemed as appropriate, 24 (8.89%) as uncertain, and 46 (17.04%) as inappropriate. Summarized below are the criteria for those 200 scenarios deemed appropriate for MMS.

Areas of Body

- Area H: 'Mask areas' of face (central face, eyelids- including medial and lateral canthi, eyebrows, nose, lips- cutaneous/mucosal/vermillion, chin, ear and periauricular skin/sulci, temple); genitalia (including perineum and perianal), hands, feet, nail units, ankles, and nipples/areola
- Area M: Cheeks, forehead, scalp, neck, jawline, pre-tibial surface
- Area L: Trunk and extremities (excluding pre-tibial surface, hands, feet, nail units and ankles)

Patient Characteristics

- Immunocompromised (IC): HIV, organ transplant, hematologic malignancy, or pharmacological immunosuppression
- Genetic Syndromes: Basal cell nevus syndrome, Xeroderma pigmentosum, or other syndromes at high risk for skin cancer
- Prior radiated skin: previous therapeutic radiation in same area of skin cancer
- Patient otherwise healthy but known to have high risk tumors (unexpectedly more aggressive than suggested by clinical appearance)
- Healthy: No immunosuppression, prior radiation therapy, chronic infections or genetic syndromes at high risk for skin cancer

Tumor Characteristics

- Positive margin on recent excision
- Aggressive Histologic Features:

BCC: infiltrative, morpheaform, fibrosing, sclerosing, metatypical/keratinizing, micronodular

SCC: keratoacanthoma (KA), poorly differentiated or undifferentiated, infiltrative, sclerosing, basosquamous, small cell, spindle cell, pagetoid, single cell, clear cell, lymphoepithelial, sarcomatoid, any histology with Breslow depth \geq 2 mm, Clark level \geq IV, or with perineural or perivascular invasion

Indications for Mohs Surgery for Basal Cell (BCC) and Squamous Cell Carcinomas (SCC)

To summarize: **All histologic types and sizes of BCC and SCC on the head and neck (areas H and M) are appropriate for MMS (with the exception of superficial BCC in area M, IC only).** Trunk and extremities (area L- excluding hands, feet, ankles, pre-tibial, perineum, perianal) have more specific criteria for MMS based on histologic types and size of tumor- see below).

| | <u>Area H</u> | <u>Area M</u> | <u>Area L</u> |
|-----|---|--|---|
| BCC | <u>Primary or Recurrent:</u> Aggressive Nodular Superficial | <u>Primary or Recurrent:</u> Aggressive Nodular Superficial (IC) | <u>Recurrent:</u> Aggressive Nodular <u>Primary:</u> Aggressive ≥ 0.6 cm Nodular ≥ 2.0 cm Nodular (IC) ≥ 1.1 cm |
| SCC | <u>Primary or Recurrent:</u> Aggressive Non-aggressive KA-type SCC SCC in situ/Bowen's Verrucous | <u>Primary or Recurrent:</u> Aggressive Non-aggressive KA-type SCC SCC in situ/Bowen's | <u>Primary or Recurrent:</u> Aggressive <u>Recurrent:</u> KA-type SCC Non-aggressive <u>Primary > 2 cm:</u> Non-aggressive SCC in situ/Bowen's <u>Primary ≥ 1.1 cm:</u> Non-aggressive (IC) KA-type SCC SCC in situ/Bowen's (IC) KA-type SCC (IC) ≥ 0.6 cm |