

# Unique Clinical Aspects of Nasal Scarring



Benjamin P. Caughlin, MD<sup>a,b</sup>, Christian Barnes, MD<sup>a</sup>, J. Stuart Nelson, MD, PhD<sup>a</sup>, Brian J.F. Wong, MD, PhD<sup>a,\*</sup>

## KEYWORDS

• Scar revision • Laser • Nasal scar • Facial scar • Surgical scar revision

## KEY POINTS

- Various methods are available for refining scars of the external nose and optimal scar revision frequently requires the utilization of multiple techniques.
- Differing anatomy of nasal subunits and their underlying structural framework limit surgical options in nasal scar revision compared with other areas of the face.
- An understanding of a variety of laser technologies and their specific applications can vastly aid in fine, controlled scar revision.
- Achieving optimal scar reduction regularly requires multiple stages of intervention, close follow-up, and repeat procedures.

A main focus of facial aesthetic surgery is to draw attention to the eyes. Any imperfection in nasal contour that leads to asymmetry will be noticed, and this emphasizes the importance of treating nasal injury and scar formation aggressively. The flexible cartilaginous framework of the nose is enveloped by a skin soft tissue envelope (SSTE) of variable thickness. It is this framework particularly over the nasal tip that must counter the forces generated by wound healing and contracture. In contrast, over the superior nasal dorsum (supported by bone), and the middle vault (by the relatively firm fusion of the dorsal quadrangular and upper lateral cartilages) deformation of the SSTE is less dramatic after injury or defect closure. The varying thickness of the skin in combination with the varying stability of the structural framework (eg, tip vs dorsum) leads to differences in response in contrast to scar and injury management in most other regions of the face. This is amplified by the ability of the eye to discern even small changes in facial symmetry and structure. For example, the smallest amount

of contracture at the alar rim or soft tissue triangle can result in asymmetry and thus noticeable deformation. In contrast, injury and subsequent scar formation over the osseous nasal framework can be treated conservatively, as the surface is firm and adjacent skin is linked to bone via periosteal attachments.

Finally, the nose is a functional organ that supports air flow and mechanically filters, warms, and humidifies inspired air. Significant scarring can lead to collapse of the internal and external nasal valves. All nasal surgeons must appreciate this when planning wound management or reconstruction and when deciding how to best treat nasal scars and defects.

## MANAGEMENT AND TREATMENT

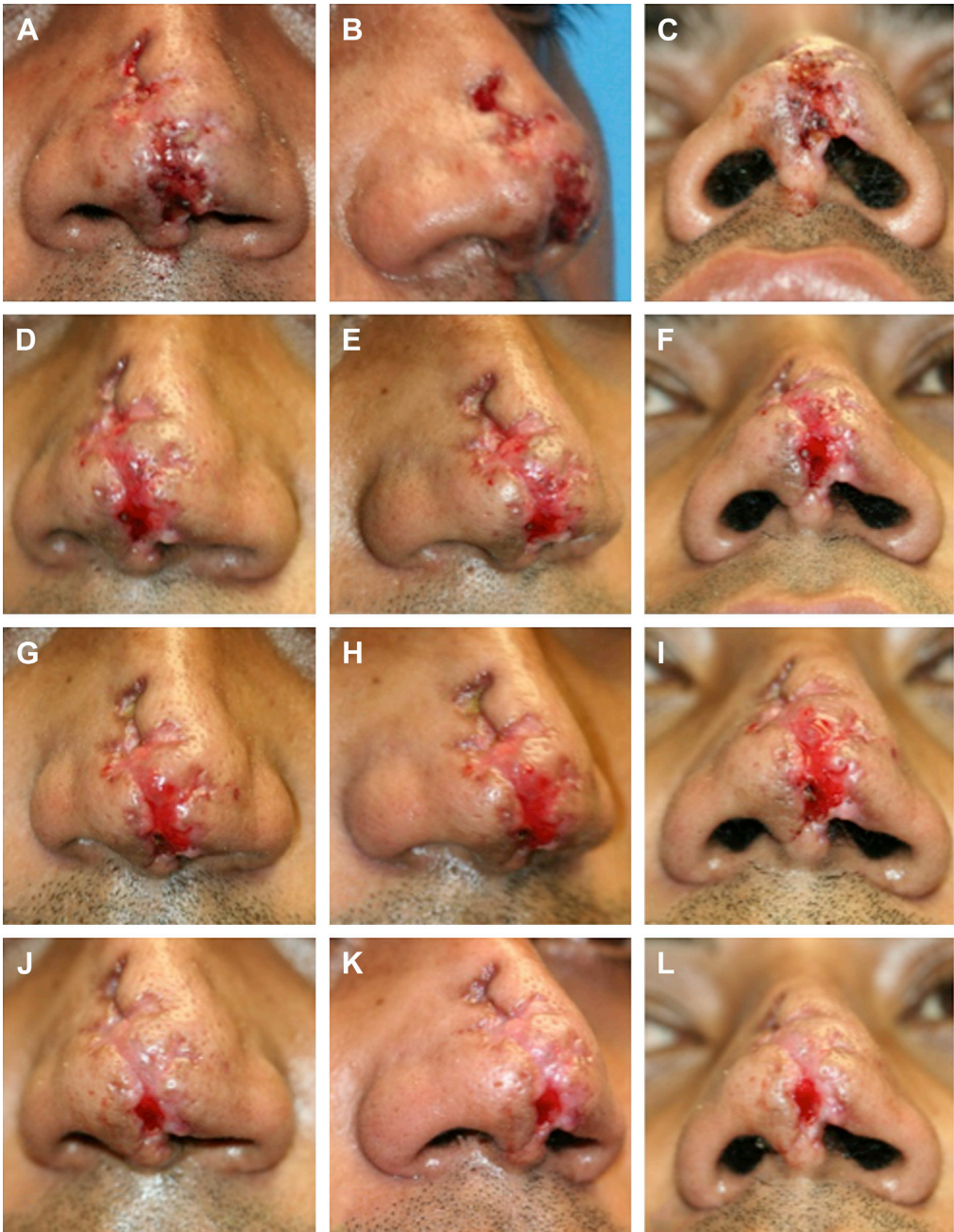
### *The Art of Doing Nothing*

Healing by secondary intention can produce stable outcomes that are cosmetically acceptable, when applied in a measured and judicious manner. This is important to consider especially

<sup>a</sup> UC Irvine Department of Head & Neck Surgery, 101 The City Drive South, Orange, CA 92868, USA; <sup>b</sup> Facial Plastic and Reconstructive Surgery, 50 E Washington, Chicago, IL 60602, USA

\* Corresponding author.

E-mail address: bjwong@uci.edu



**Fig. 1.** The nasal tip of a 28-year-old Hispanic man who underwent open rhinoplasty with defatting of the tip SSTE and aggressive postoperative tape application (elsewhere). This led to postoperative vascular compromise followed by infection and tissue breakdown. The wound was treated with local wound care including antibiotic ointment (mupirocin) and frequent dressing changes during the acute phases of wound healing by the senior author (BJFW). The patient additionally received 6 rounds of hyperbaric oxygen therapy, frequent visits for wound debridement, comedone extractions, and 1 episode of free hand microneedling to release the scar. Images were obtained at presentation (A–C), 5 days (D–F), 1 week (G–I), 2 weeks (J–L), 4 weeks (M–O), 8 weeks (P–R), 14 weeks (S–U), and 27 weeks (V–X). The final images show the defect at 46 weeks and after 1 treatment with injectable hyaluronic acid (Y–AA) (performed elsewhere).

Download English Version:

<https://daneshyari.com/en/article/5714434>

Download Persian Version:

<https://daneshyari.com/article/5714434>

[Daneshyari.com](https://daneshyari.com)