

Endoscopic Laryngeal Shave

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CLINICAL ISSUE

Reduction of prominent laryngeal cartilage is one desired goal of trans female patients. An incision is typically made on the anterior neck or in the submental area to access the site. Depending on the patient's scar reactivity, this can become a distressing visible reminder of their former self. Minimally invasive [MI] chondrolaryngoplasty can eliminate this.

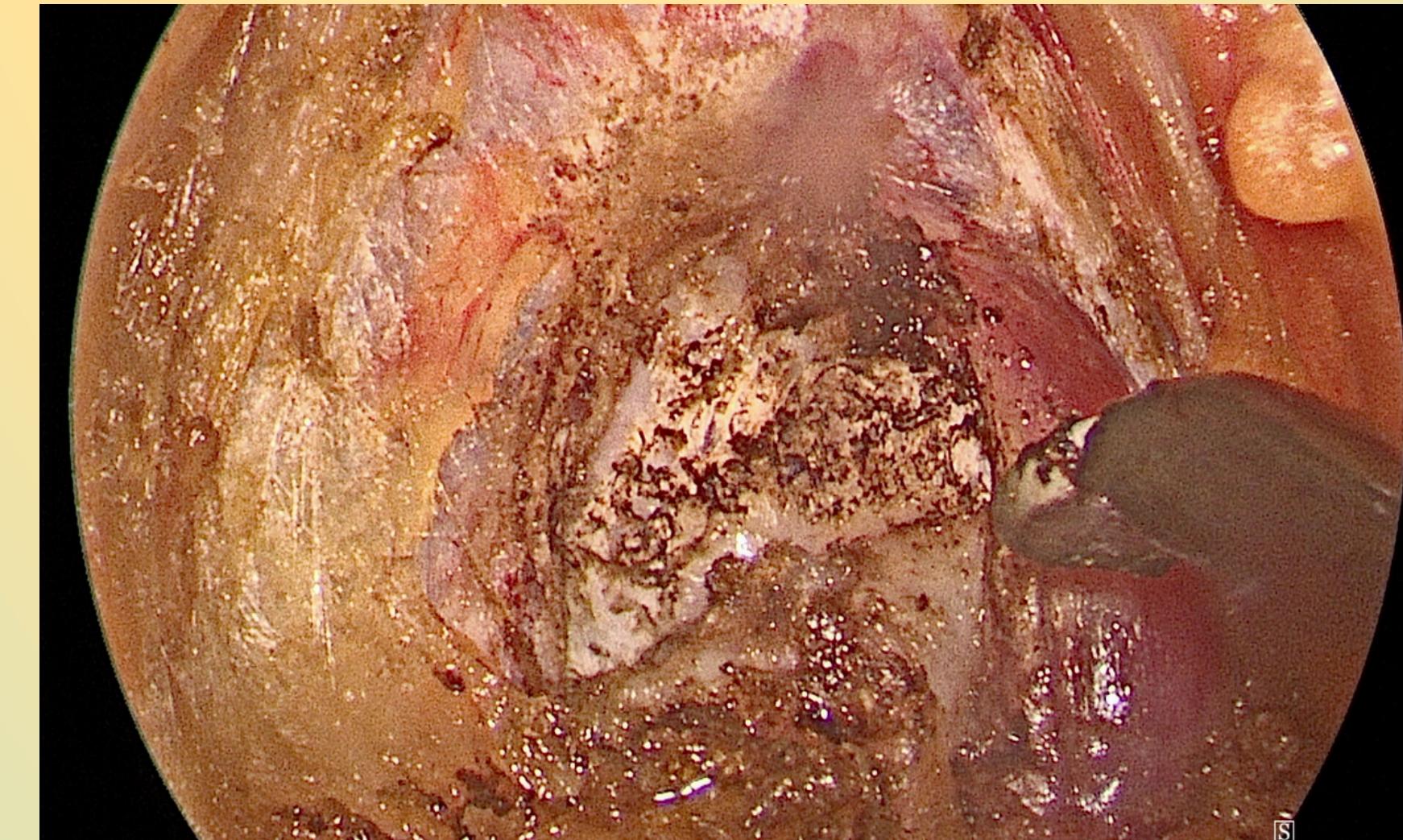
TEAM

The team is a collaboration between Head and Neck and Plastic Surgery. Surgeons, nursing team leaders, and sterile processing all contribute their skills.

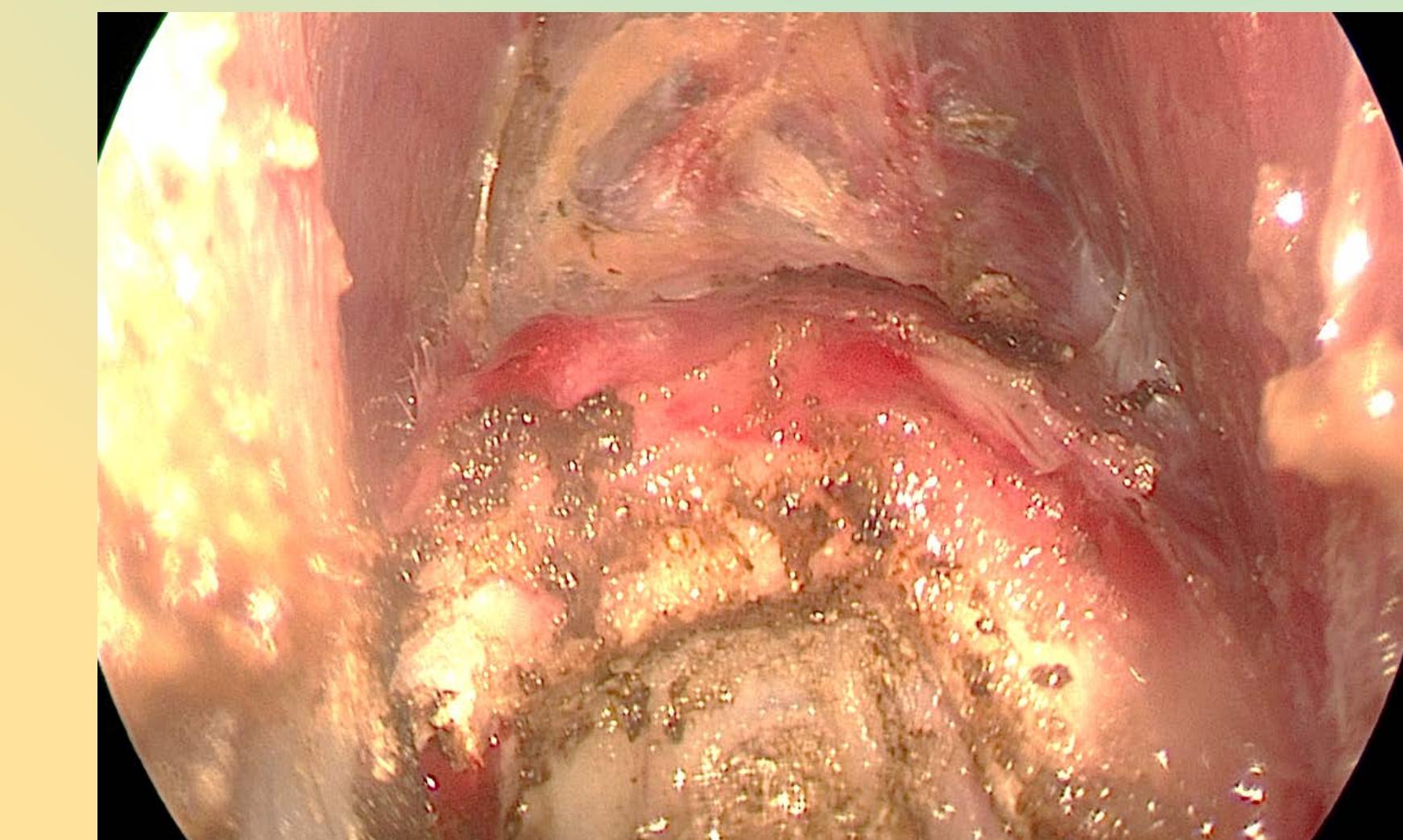
Vendors were recruited to source the non-traditional instruments for this procedure.



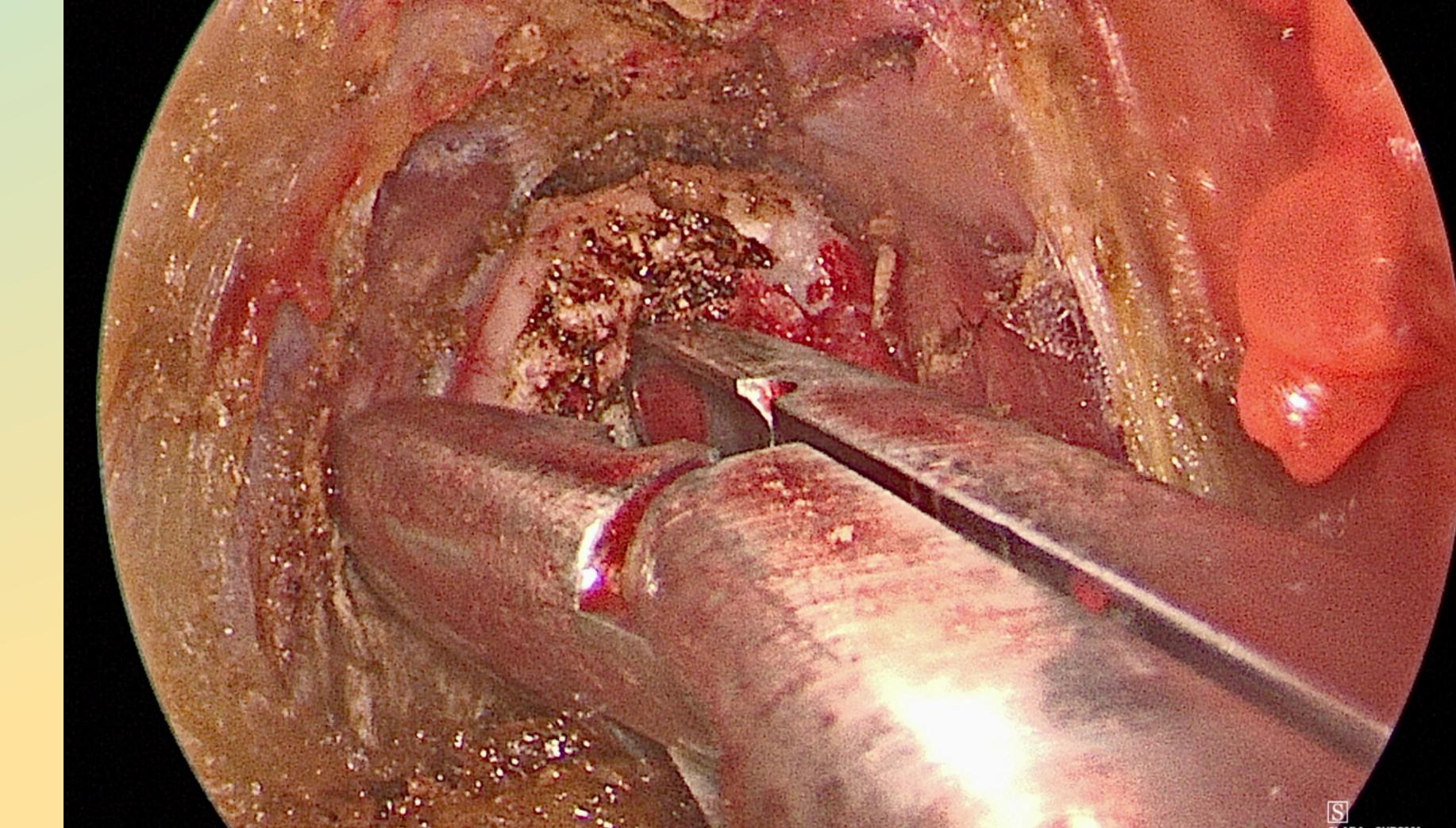
Laryngeal marking.



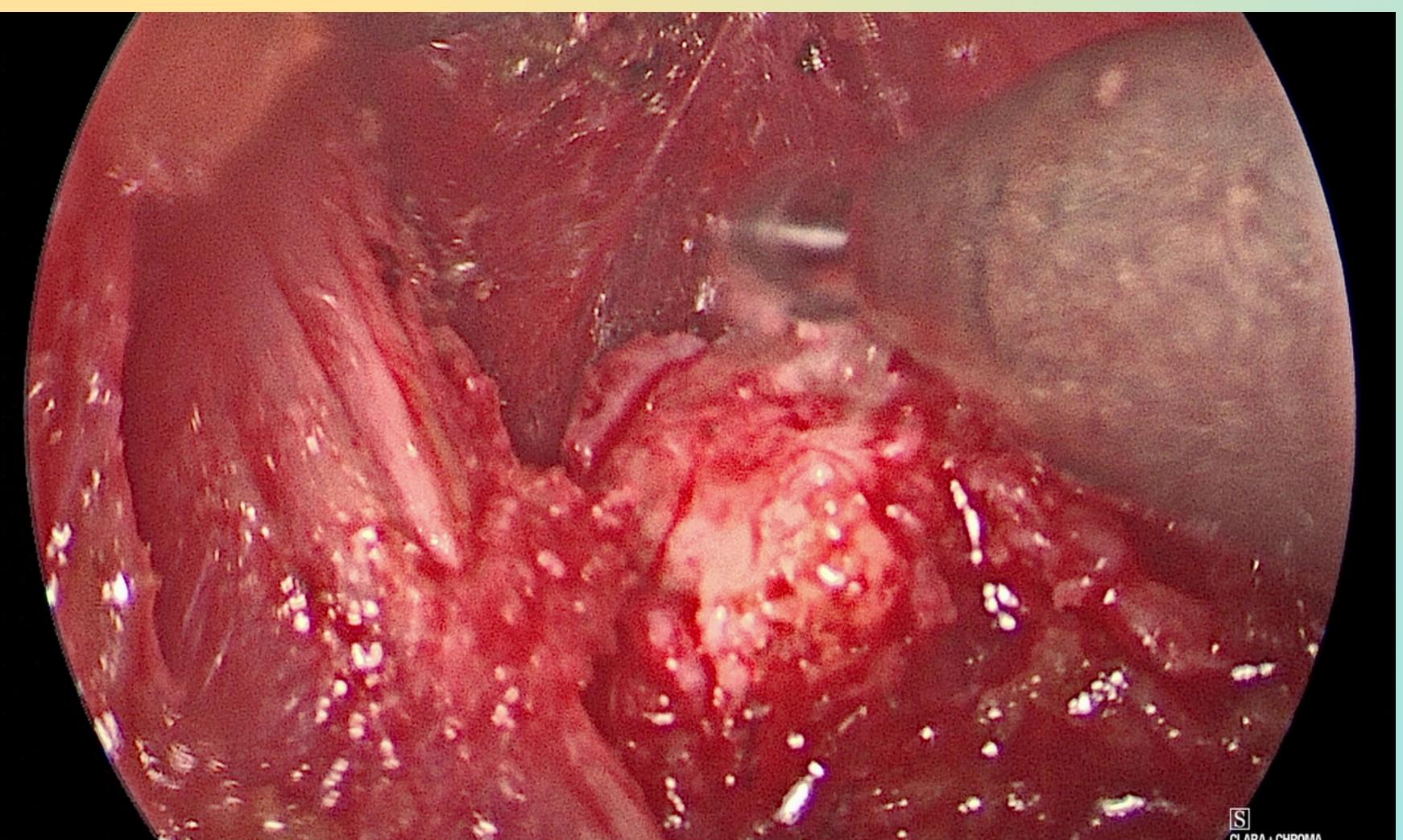
Dissecting the laryngeal cartilage.



Laryngeal cartilage.



Removing the laryngeal cartilage with ronguer.



Burring the laryngeal cartilage hood.

ASSESSMENT

Patient's request for scar-less laryngeal reduction, prompted the collaborating Head and Neck surgeon to develop a MI technique.

PREP / PLANNING

The approach requires hyperextension of the neck to maneuver over the chin, allowing entrance midline between the lower gingiva and lip. Unlike typical MI surgery, the anterior neck has no expandable cavity in which to work. Maintaining a 'space' to visualize and perform the reduction was addressed with a hooded endoscope sheath. Debriefings after initial procedures modified instrument selection and technique.

IMPLEMENTATION

With the head in hyperextension, the trachea margins are outlined on the skin for reference. The incision is intraoral, midline in the inferior labial frenulum. The larynx is dissected centrally and laterally with a spatula cautery. Detaching the strap muscles is avoided. Care is taken to prevent internal pressure or thermal disruption to the overlying skin flap. A ronguer is used to break and remove the lateral portions of the laryngeal cartilage. A high speed burr finishes reducing the laryngeal prominence.

OUTCOME

A neck contour complimenting the patient's body habitus and gender identity is the result.

Reduction, not complete removal of the laryngeal cartilage, is obtained in all instances

IMPLICATIONS FOR NURSING

Be aware of potential complications:

- thermal and ischemic damage to the overlying anterior neck skin
- breech of the tracheal membrane causing a tracheal air leak.



Before

After

