Aesthetic Cervicofacial Surgery for Head and Neck Tumor Patients

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Abstract. Carefully selected head and neck tumor patients can safely undergo a wide variety of aesthetic surgical procedures. The malignancy must first be adequately treated and clinically controlled before elective surgery. Each tumor patient's general health and life expectancy must be honestly assessed prior to aesthetic surgery, because operating on an individual who cannot survive to enjoy the benefits is injudicious. Through the combined efforts of sophisticated oncology and plastic surgery, the patient survival rate can be improved as quality of life is enriched in appropriately selected and carefully managed individuals.

Key words: Tumors, head and neck — Cervicofacial surgery

One out of every four individuals alive today in America can anticipate developing some type of malignancy during his or her lifetime. In 1982, a total of 835,000 persons were diagnosed as having cancer. Of these tumors, approximately 5% involved the head and neck [5]. Body image problems created by the constant public display of the results of extirpative surgery can be particularly burdensome to those afflicted [6]. With awareness and demand increasing for an expanded assortment of aesthetic plastic surgical procedures, a growing number of cancer patients is requesting secondary elective surgery. Because of recent advances in medical and surgical oncology and plastic surgery, carefully chosen head and neck cancer patients who previously may have been rejected as unsuitable aesthetic candidates may now benefit from plastic surgery. By receiving the combined efforts of oncologists and plastic surgeons, these patients can anticipate improvement in both quantity and quality of life.

Indications for Surgery

General indications for aesthetic cervicofacial surgery, such as face- and neck-lift, in head and neck tumor patients include: (1) correction of facial and cervical contour defects; (2) revision of scars; (3) simultaneous resection of small skin tumors (such as basal cell carcinoma); (4) treatment of Frey's gustatory sweating; (5) tightening of laxity secondary to facial nerve weakness; (6) excision of treatment-induced skin disorders (facial scarring as an untoward result of chemotherapy or radiation therapy); and (7) improvement of quality of life.

The 69-year-old woman in Fig. 1 underwent total thyroidectomy and right radical neck dissection, including removal of the sternocleidomastoid muscle, in 1974 for metastatic papillary thyroid carcinoma. In 1978 she required a modified left radical neck dissection, preserving the sternocleidomastoid muscle and spinal accessory nerve, for treatment of metastatic papillary carcinoma. A face and neck lift and upper blepharoplasty were performed in 1982 in an effort to improve the cervicofacial contour and to relocate the radical neck dissection scars posteriorly.

The 77-year-old patient seen in Fig. 2 underwent an extensive left radical neck dissection over 40 years ago for scrofula [1]. She subsequently devel-
Fig. 1(A) A 69-year-old female, 9 years following right radical neck dissection and 7 years after left radical neck dissection for metastatic papillary carcinoma of the thyroid gland. (B) One year following meloplasty, submental lipectomy, and upper blepharoplasty. The radical neck scar has been posteriorly relocated and neck contour improved.

Fig. 2(A–C) A 77-year-old woman 40 years following extensive left radical neck ablative surgery for scrofula. (D–F) Early result following cervicofacial rhytidectomy, recontouring of the neck deformity, upper and lower blepharoplasty.

oped left buccal branch facial weakness and a basal cell carcinoma in front of the left earlobe. This skin tumor was resected at the time of cervicofacial rhytidectomy, while facial balance was improved.

Figure 3 shows a 64-year-old woman who had suffered from Frey’s gustatory sweating following a parotidectomy performed 10 years ago. She has now enjoyed two years’ relief from the symptoms after her face and neck lift. The evolution of Frey’s syndrome is depicted in Fig. 4 [2, 7, 10]. The mechanism by which a face lift may have resolved this patient’s symptoms is illustrated in Fig. 5. The aberrant parasympathetic fibers previously innervating sweat glands in the skin are severed and fail to reconnect [11].

The 41-year-old Hodgkin’s disease patient shown in Fig. 6 developed forehead and right upper eyelid scarring as a sequela of long-term Adriamycin chemotherapy and Herpes Zoster of the ophthalmic branch of the trigeminal nerve. Figures 6C and D