PERICRANIAN FLAP IN ORAL AND FACIAL RECONSTRUCTION

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Abstract: Oral and facial defects resulted after large tumoral excision requires a reconstructive option adapted to esthetic and functional needs of the patients. Local and regional options of flaps proves to be predictable, easy to harvest and the postoperative complications almost nule. In the ladder of reconstructive options pericranial flaps standing at the base, are going to permit selection of other complex reconstructive possibilities if needed. The temporal and fascial tempora-parietal flap through theirs large area, wide rotation angle are primary options in the reconstruction of the oral and facial defects consecutive to tumor excision.

INTRODUCTION

The fascial flap is one of the oldest used, first mentioned in 1898 by Monks(1) and Brown(2) which used it for the reconstruction of a inferior palpebra and ear defect. Later is used by Esser(3) who uses it toghether with hair bearing skin for the reconstruction of a inferior palpebra and ear defect. Later is mentioned in 1898 by Monks(1) and Brown(2) which used it for the reconstruction of a inferior palpebra and ear defect. Later is used by Esser(3) who uses it together with hair bearing skin for the reconstruction of the eyebrow.

Temporal flap

The vascular supply of the muscle distributes secedent being possible to dissect it in coronal plane, thus parting it in posterior and anterior segment or transversally being parted in medial –lateral segments(4). Raising the flap is done by performing a curved incision from the level of the helix up to the lateral pericranium. The incision deepens to the level of the cranium sparing the zygomatic arch area(5).(Fig.1).

Figure no. 1 Temporal flap (LT) in donor space will be used to fit the orbit defect (O) postexenteration. Cranium(C)

Next we incise the fascia superficial to the zygomatic muscle and dissect this plane to the zygomatic emminence medial. The muscle easily raises of the bony plane and next we tunnel the infratemporal space. In this tunnel the muscle is rotated, pulled through and applied in the defect(6). The sutures in the mucosal planes are done by surmounting one another this way creating a barrier against salivary penetration(7).

The advantages of this flap are: minimal morbidity of donor space and the relative neighbournness with the defect(8).

Temoral flap

Along the years this flap has been used in numerous functional and esthetic reconstructive possibilities(9).

Restorations of defects after maxillectomy, mandibulectomy, anterior skull base resections, oral cavity, base of the tongue, pharyngeal, orbital, ear, mastoid, pericranian, dura, cheeks, lips eyelids and finnaly eyebrows(10). Also the constant vascular inflow permits the use of this flap in infected areas such as: mandibulal osteomielitis, osteoradionecrosis of maxillary bones or protective role in covering of the carotid arteries(11).

The fascial temporoparietal flap may be used as a composite solution of reconstruction being harvested with the outer cortex or full thickness cranium for the tridimensional restoration of bony defects after maxillectomy, mandiblectomy or reshaping the orbital floor(12). This possibility was mentioned by Conley but also involving the temporal muscle.

Harvesting the flap needs first identification of the vascular pedicle with the help of ultrasongraphy and marking this cutaneous trajects. We perform the incision at the base of the helix next going upward. The temporalis fascia continues inferiorly with the SMAS(superficial musculoaponevrotic system) and superiorly galea aponeurotica. The vascular pedicle contains the superficial temporal artery and vein. The dissection will be performed to level of the vertex, and for wide harvesting a perpendicular incision on the first one will be associated being possible to harvest 17 per 14 cm. The superficial dissection will be done in subdermal plane to spare the hair folliculi and thus avoiding the consecutive alopecia. The pedicle will next be...
dissected and progressively thinned and tailored to the level of the zygomatic bone. Next we are going to tunnel a space to the level of the oropharynx through which the flap is going to fit the defect. The pliability of this flap permits positioning in various sized defects and next the flap will heal by secondary epitelisation.

**BIBLIOGRAPHY**