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## CASE AND RESEARCH LETTERS

## Reconstruction of the Ala Nasi Using a Malar Turnover Island Pedicle Flap\*



Reconstrucción del ala nasal mediante colgajo malar invertido de pedículo subcutáneo

To the Editor:

Squamous cell carcinoma is a rapidly growing tumor that can cause local damage and also has metastatic potential. Reconstruction of the nasal pyramid is a challenge for the surgeon as not only should functionality be maintained but the esthetic impact should also be minimized.

We present the case of a 97-year-old woman who attended our clinic with a very painful, fast-growing tumor, first noted 4 months earlier. The lesion, on the left nasal ala, was an ulcerated tumor and measured  $3.5\times4.5\,\mathrm{cm}$  in its longest diameter (Figure 1). Biopsy confirmed the suspected diagnosis of squamous cell carcinoma and surgical excision was indicated.

The entire nasal ala was excised under local anesthetic, with a 5 mm margin, including the mucosal and cartilaginous layers as well as the tissue adjacent to the upper lip and left malar region (Figure 1B). Given that most of the nasolabial fold had been excised, it was decided to use a malar turnover island pedicle flap for reconstruction.

The design of the skin island flap aligned the upper edge with the upper border of the mucosal defect. The lower half





Figure 1 Squamous cell carcinoma in the left nasal ala. A, Lesion prior to surgical excision. B, Surgical defect after excision of the tumor.

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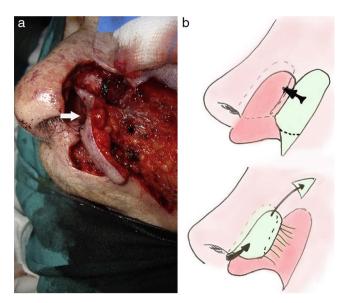


Figure 2 Reconstruction. A, Design of the flap, showing the cut of the subcutaneous pedicle (\*) and suture of the turnover island (arrow). B, Schematic of the flap.

of the flap was marked out to reflect the length of the nasal skin defect. The pedicle of the flap was dissected below the subcutaneous cell tissue, such that it retained a diameter of at least 1.5 cm and its base was located in the most proximal part of the surgical defect (Figure 2A), retracting the subcutaneous tissue from the base of the rest of the flap. After turnover of the island, the mucosal defect was sutured with resorbable material (Figure 2A [arrow] and B). A guide suture (single 4-0 silk stitches) was used along the edge of the nasal ala. After layer closure of the defect of the upper lip and the malar area using an advancement flap, the flap was folded onto the nasal ala and the skin defect was reconstructed. The flap was cut to adapt it to the defect and sutured (Figure 3) with single stitching with nonresorbable material (4-0

silk). A transfixion suture was used for the alar flap to facilitate its complete coaptation and avoid ischemia. Antibiotic prophylaxis was prescribed and anterior nasal packing was applied with a compressive dressing for the first 48 h.

The postoperative period was satisfactory, with no complications. The stiches were removed 7 days after the operation. The nasal cavity did not collapse and good ventilatory function was maintained (Figure 3B).

Complete reconstruction of surgical defects in the nasal ala is often encountered in everyday surgical practice. Traditional use of the nasolabial fold is not practical in cases in which the surgical defect includes this region. In 1987, Spear et al.<sup>1</sup> reported a variation of the nasolabial flap in which the flap was inverted, maintaining the subcutaneous pedicle. The turnover malar flap of the subcutaneous pedicle is a variant of this procedure and extremely useful when the surgical defect includes the nasolabial fold.

In the design, the cutaneous island should be adjusted to the size of the defect. The width should be the same as the horizontal size of the region to be reconstructed. The length should be at least twice that of the defect to enable mucosal and cutaneous reconstruction. The pedicle should be cut to a depth of 2-3 mm at the level of the subcutaneous cellular tissue. The distal three-quarters of the pedicle should be freed from the underlying tissue, with only one-quarter remaining anchored. Excess fatty tissue in the island should be removed to improve the esthetic result. It is recommended to prescribe antibiotic prophylaxis both intraoperatively and postoperatively in these patients.

The complications are those inherent in all flap interventions. Necrosis is generally caused by an insufficiently large or twisted pedicle. The trap door effect may not necessarily occur if the fatty material is removed from the flap. It should be remembered that there may be facial hair on the nasal pyramid, and this could be avoided by leaving out hair-covered areas when designing the cutaneous island.

A major limitation lies in the absence of cartilaginous structure or support, which would not only improve the

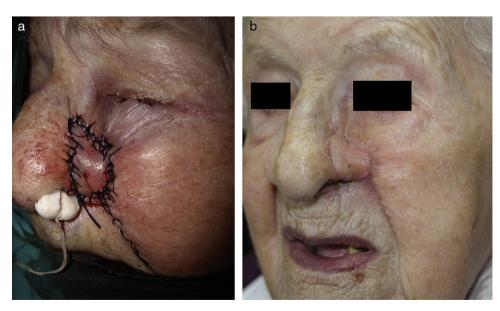


Figure 3 Outcome. A, Immediate outcome after suture of the flap. B, Outcome at 3 weeks after the intervention.

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esthetic outcome, but would also prevent collapse with inspiration. This could be overcome by adding a free cartilage graft from the concha of auricle<sup>5,6</sup> or a titanium mesh,<sup>5</sup> although such procedures were considered unnecessary in this case given the age of the patient. Other reconstruction options requiring a single intervention are nasolabial transposition flap or subcutaneous turnover pedicle,<sup>1,7</sup> but these are not useful in this case because the surgical defect would include this region.

Reconstructive surgery was performed in a single intervention of the nasal ala and perialar region, using a malar turnover island pedicle flap. The functional and esthetic outcomes were good. This technique is a very useful tool for the reconstruction of large defects in the nasal ala with involvement of the nasolabial fold, which rules out use of this structure for the flap design.

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Detection of *Chlamydia trachomatis* Infection in Patients Seen at a Sexually Transmitted Infection Clinic\*



Detección de la infección por *Chlamydia Trachomatis* en pacientes que consultan por una infección bacteriana de transmisión sexual

To the Editor:

Chlamydia is the most common bacterial infection transmitted sexually in Europe and it is particularly common in young people. According to the World Health Organization, 10% of sexually active people under 25 years of age may be infected. Chlamydia can affect both men and women, but complications are more common in women. Based on official data from the European Center for Disease Prevention and Control, certain socioeconomic statuses and sexual behaviors are associated with increased vulnerability to sexually transmitted infections (STIs).

According to studies of different populations in Europe, the estimated prevalence of *Chlamydia trachomatis* infection, or chlamydia, is between 4% and 6%.<sup>4,5,6</sup> Up to 70% of infections in women are asymptomatic,<sup>7</sup> and chlamydia increases the risk of infection by the human immunodeficiency virus and other STIs, such as gonorrhea.<sup>8</sup> Notification

of individual cases of genital chlamydial infection is not a requirement in Spain, where epidemiological surveillance is organized through the Microbiological Information System. In Catalonia, where our hospital is based, the number of cases of genital chlamydia must now be reported, a requirement that led to a 29% increase in the number of cases reported between 2011 and 2012.

We performed a prospective descriptive study of the frequency of chlamydia in patients seeking treatment for a suspected STI at the STI unit of Hospital Universitario Arnau de Vilanova in Lleida between November 2012 and November 2013. All patients were asked if they wished to participate in the study and those who agreed signed an informed consent form.

During the visit, apart from history taking and tests relevant to the patient's presenting condition, each patient was asked if they would provide samples (urethral for men and cervical for women) to test for chlamydia. The detection methods used were the polymerase chain reaction nucleic acid test (Anyplex CT/NG Real-time Detection, Seegene) and immunochromographic antigen detection. Patients diagnosed with *C trachomatis* infection were given cards to pass onto their sexual contacts to come in for evaluation.

Information on the study variables was collected in face-to-face interviews with the patients (Table 1). The prevalence of chlamydial infection in the subgroups analyzed was calculated with 95% CIs. Associations between the dependent variable (chlamydia) and the main independent variables were assessed by odds ratios and 95% CIs.

In total, 107 patients (68.2% men) were included in the study. Most (71.1%) had secondary or university studies. Almost 40% of the patients were aged between 26 and 35 years, 58.9% stated that they did not generally use contraception methods, and 5.6% reported working as a sex worker.

<sup>\*</sup> Please cite this article as: Yuguero O, Casanova J, Manonelles A, Godoy P. Detección de la infección por *Chlamydia Trachomatis* en pacientes que consultan por una infección bacteriana de transmisión sexual. Actas Dermosifiliogr. 2015;106:235-238.