SURGICAL PEARLS ABSTRACTS

Buccal Mucosa Grafts for Reconstruction in Patients With Female Genital Mutilation

Presenter: Catherine Calvert, MD
Co-Authors: Takintope Akinbiyi, MD; Shelby Nathan, MD; Ivona Percec, MD, PhD
Affiliation: University of Pennsylvania, Philadelphia, PA

AIM: Reconstruction after female genital mutilation is a relatively new concept in the United States aimed to improve pain and sexual function and to restore a normal physical appearance. The buccal mucosa has been described as a donor-site option for reconstruction of eyelids, cheeks, larynx, urethra, and more recently the vagina. Here we present the novel use of buccal mucosal grafts in the reconstruction of external female genitalia after female genital mutilation.

METHODS:
1. Mouth is irrigated with Peridex solution and throat pack is placed.
2. Rectangular piece of thin buccal mucosa is harvested using a #15 blade with care to avoid important structures such as buccal fat pads, buccinator muscle, and Stensen's duct. Incisions are closed in a single running layer with 4-0 chromic suture.
3. Anterior abdomen fat harvesting is performed using standard Coleman technique. Fat is processed via Telfa rolling on back table.
4. Clitoral scar is incised or excised with careful attention to avoid injury to deeper nerves.
5. A flap harvested from the superior aspect of clitoral skin is rotated inferiorly to cover the superior aspect of the clitoral hood. The remainder of the hood is resurfaced using shaped portions of the buccal mucosa sutured with 4-0 chromic.
6. Flaps from the labia majora are rotated laterally and imbricated to the periosteum with interrupted 4-0 chromic. Medial flaps designed to become the new labia minora are subsequently covered with buccal mucosal grafts on their lateral aspects.
7. Buccal mucosal grafts were dressed with xeroform and antibiotic bolsters.
8. Fat subsequently grafted into bilateral labia majora inferiorly and superiorly into the vulvar region to encourage regeneration of the surgical site.

RESULTS: The authors have observed excellent cosmetic outcomes at 6 months postoperatively with well-incorporated tissue. Patients report significantly improved functional outcomes with postoperative clitoral retraining therapy.

CONCLUSIONS: Benefits of using the buccal mucosa as a donor site are similar to those reported previously. Namely, these include an inconspicuous donor site scar, primary closure of the donor site, and a decreased need for local tissue rearrangement and distortion of anatomy due to a distant donor site.1,2 As with any new technique, further investigation is needed to examine the long-term functional and cosmetic outcomes, including patient satisfaction and sexual function. Exposure of this technique to plastic surgeons will enable the therapeutic benefits to this greatly underserved population.

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Clinical Performance of a Skin Barrier Device as Part of a Standardized Infection Reduction Study of 218 Implant-based Breast Reconstructions

Presenter: Chris Alan Campbell, MD, FACS
Co-Authors: Angel Hsu, BS; David Lobb, MBChB
Affiliation: University of Virginia, Charlottesville, VA

PURPOSE: Due to the critical impact of breast implant infection on quality of life of breast cancer patients, we have published the performance characteristics of an evidence-based protocol that significantly reduced but did not eliminate Gram-positive infection after mastectomy. To provide a skin barrier against bacterial contamination from the skin flora, we added the Alexis wound manager (AWM) to the evidence-based protocol at the time of immediate expander placement.

METHODS: An evidence-based protocol was developed including preoperative decolonization with intranasal Bactroban, and chlorhexidine body wash for 5 days, intraoperative double gloving with glove change, chest reprep before expander placement, triple and povidone iodine washes of implant and pocket and postoperative Gram-positive oral antibiotic prophylaxis until drain removal. In an effort to...
further decrease skin flora implant infections, an AWM was added to the protocol after our first 86 patients. All patients underwent immediate acellular dermal matrix-assisted, partially submuscular tissue expander placement with a single drain placed except when axillary lymph node dissection was performed resulting in 2 drains for that breast. A retrospective review of a prospectively maintained database of consecutive immediate breast tissue expander reconstructions was performed comparing demographics, treatment characteristics, and infection-related clinical outcomes of all patients completing the protocol with and without the AWM.

RESULTS: One hundred thirty-five breasts among 86 patients were reconstructed under the protocol alone, and 83 breasts among 46 patients were reconstructed under the same protocol with AWM. The 2 group of patients were statistically similar in age, body mass index, comorbid conditions, percentage of smokers, and rates of postoperative radiation. Overall (8.1%), major (2.9%) and minor (5.2%) infection rates were greater with the protocol alone than with the addition of the AWM (overall 7.2%, major 2.4%, and minor 4.8%), yet these differences were not significant. Explantation rates were higher as well in the protocol-only group (2.9%) than with the AWM (1.2%; P = 0.35). Drain duration was statistically significantly shorter with the AWM (12.6 days) than the protocol-alone group (17.6 days; P < 0.01).

CONCLUSIONS: The use of a skin barrier as an addition to an evidence-based infection reduction protocol was associated with a modest improvement in infection outcomes and explantation rates and resulted in a significantly shorter drain duration.

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Medical Malpractice Claims After Nonsurgical Cosmetic Procedures

Affiliation: Warren Alpert Medical School of Brown University, Providence, RI

BACKGROUND: Nonsurgical procedures account for >40% of the 15 billion dollars spent on cosmetic procedures nationally each year. These procedures are being performed by physicians across a multitude of both surgical and nonsurgical specialties, and by physician extenders. Although nonsurgical procedures are often viewed as a low-risk alternative to cosmetic surgery, they are not without their own complications. Consequently, physicians assume the risk of malpractice litigation when performing or supervising such procedures. There is a paucity of literature regarding malpractice claims associated with nonsurgical cosmetic procedures. The goal of this study is to use multiple national legal databases to characterize such malpractice claims.

METHODS: Retrospective analyses of both the Westlaw legal database and VerdictSearch legal database were performed on all legal cases from 1985 to present that resulted in a verdict or settlement related to nonsurgical cosmetic procedures. The 10 most common nonsurgical cosmetic procedures were included in the search query. Malpractice cases were reviewed individually to ensure that they were directly related to nonsurgical cosmetic procedures and then the databases cross-referenced to eliminate any duplicates. The final combined database was then analyzed based on the procedure, primary malpractice claim, defendant qualifications and specialty, the case outcome, and the amount of award in case of plaintiff decision/settlement.

RESULTS: A total of 68 individual cases were collected and analyzed. The most common procedure was laser resurfacing (n = 20), followed by chemical peel (n = 17) and laser hair removal (n = 16). Despite being the most and second most common procedures performed over the last 2 decades, botulinum toxin injection and dermal filler injection only accounted for 1 and 8 malpractice claims, respectively. The most common cause for litigation for laser resurfacing (90%), chemical peel (94%), and laser hair removal (94%) was burns/scarring due to alleged inappropriate administration, whereas the most common cause for litigation after dermal filler injection was nodule/cyst formation (50%). Thirty-eight percent of all cases resulted in a decision in favor of the plaintiff (against the physician) and 6% of cases were settled out of court. The remaining resulted in favor of the defending physician. The average award after a decision in favor of the plaintiff was for $440,323.27 ± $419,404.77. The average settlement was for $393,625.00 ± $240,355.77. The majority of providers with identified specialties were board-certified plastic surgeons (n = 20), followed by dermatologists (n = 14) and ophthalmologist/ocularplastic surgeons (n = 6). There was a disproportionate number of general practitioners (internists, family practitioners, and pediatricians) (n = 7) given the small volume of cosmetic procedures they perform.

Medical Malpractice Claims After Nonsurgical Cosmetic Procedures

Presenter: William K. Snapp, MD

Co-Authors: Daniel Kraft, BS; Charles C. Jehle, MD; Davis Hartnett, BS; Joseph W. Crozier, MA; Scott Schmidt, MD