Outpatient Male-to-Female Vaginoplasty Is a Safe Procedure

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INTRODUCTION: Male-to-female vaginoplasty using penile skin inversion has traditionally been performed as an inpatient procedure. There have been no reported series of outpatient vaginoplasty, the closest being an office-based vaginoplasty after which the patient is monitored overnight by a doctor and nurse. This study reviews our 15-year experience with strictly outpatient vaginoplasty.

MATERIALS AND METHODS: A retrospective chart review was conducted of all outpatient penile skin inversion vaginoplasties performed in our practice from 2001 to 2016. Data collection included patient demographics and comorbidities. Operative time, combined procedures, pre-operative and post-operative antibiotic use, and estimated blood loss were recorded. Immediate and early postoperative complications were identified, including infection, dehiscence, graft loss, fistula, and vaginal stenosis, along with treatment to address such complications.

EXPERIENCE: Forty-four patients who underwent outpatient vaginoplasty were included in the study. Hormones were stopped 4 weeks prior to surgery. Preoperative and 5 days of postoperative antibiotics were given. Sequential compression devices were used during surgery. Ambulation was started the day of surgery. The senior author called patients the evening of surgery and visited them the next morning. Patients were then followed on an every other day basis, visited on postoperative days 3, 5, and 7. Out-of-town patients were allowed to return home after postoperative day 7. Patients were seen in clinic 2 weeks after surgery or followed up via phone call.

RESULTS: Patient ages ranged from 18 to 70 years. All were ASA Class III or less. Average BMI was 24.3. Relevant comorbidities included smoking, hypertension, coronary artery disease, diabetes mellitus, psychiatric disorders, and use of blood thinners. Most patients underwent combined vaginoplasty with clitoroplasty. 3 patients underwent clitoroplasty without vaginoplasty. 6 patients’ vaginoplasties were combined with other procedures. Postoperative complications included infection, rectal fistula, vaginal stenosis, vaginal prolapse, urinary retention, partial skin graft loss, and partial incisional dehiscence. All complications were within previously reported inpatient vaginoplasty complication ranges. 16 patients underwent secondary cosmetic revisionary surgery.

CONCLUSION: With proper patient selection, outpatient male-to-female penile skin inversion vaginoplasty has similar complication rates compared to those performed inpatient. Outpatient vaginoplasty is safe and can help reduce the cost of surgery by eliminating hospital admission.

DISCLOSURES: None of the authors has a financial interest in any of the products, devices, or drugs mentioned in this manuscript.

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intercourse and standing micturition with a functional neo-
urethra, and has minimal complications and donor site mor-
bidity. Metaidoioplasty and radial forearm flap phalloplasty
(RFFP) are the most common procedures for neophallus con-
struction despite no comparative studies of the procedures.

METHODS: A MEDLINE search for metaidoioplasty and
RFFP in female-to-male genital reconstruction was per-
formed with outcomes compared.

RESULTS: A total of 188 articles were identified; 7 articles
related to metaidoioplasty and 11 articles related to RFFP
met inclusion criteria.

In studies examining metaidoioplasty, average study size
and follow-up was 50.9 patients and 4.6 years (2 studies
did not report [NR] these metrics). 88% had a single-stage
reconstruction (1 NR), 87% reported a satisfactorily aes-
thetic neophallus (4 NR), 100% reported erogenous sensa-
tion (3 NR), no studies reported tactile sensation (7 NR),
51% of patients were able to achieve sexual intercourse (4
NR), average strictures/fistulae per patient was 0.28 (0 NR),
75% achieved standing micturition (3 NR), average overall
complications per patient was 0.43 (0 NR), and donor site
morbidity was 6% (0 NR).

In RFFP, study size and follow-up was 60.4 patients and
6.23 years (6 NR). No patients had single-stage reconstruc-
tion (8 NR), 70% reported a satisfactorily aesthetic neo-
phallus (4 NR), 69% reported erogenous sensation (6 NR),
77% reported tactile sensation (9 NR), 43% were able to achieve
sexual intercourse (6 NR), average strictures/fistulae per
patient was 0.51 (4 NR), 75% achieved standing micturition (6
NR), average overall complications per patient was 0.88
(3 NR), and donor site morbidity was 11% (3 NR).

Comparing the groups, sample size (p=0.7722) and follow up
(p=0.1798) were similar. Compared to RFFP, metaidoioplasty
was significantly more likely to be completed in a single stage
(p<0.0001), have an aesthetic result (p=0.0002), maintain
erogenous sensation (p<0.0001) and have lower overall com-
promise rates (p=0.02). Outcomes for standing micturition
(p=1.000), urethral stricture/fistulae (p=0.08), donor site mor-
bidity (p=0.11), and ability for sexual intercourse (p=0.1061)
were similar; tactile sensation could not be compared.

CONCLUSIONS: Current literature suggests metaidoio-
plasty may more successfully achieve an ideal neophallus
than RFFP. High-quality studies with emphasis on patient-
reported outcome measures are required to more critically
evaluate female-to-male genital reconstruction.

Reliable Complex Abdominal Wall
Hernia Repairs with a Narrow Well-Fixed
Retrrectus Polypropylene Mesh: A
Review of over 100 Consecutive Cases

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INTRODUCTION: No consensus exists on the optimal
technique for repair of complex ventral hernias. Current
trends emphasize large meshes with wide overlaps and
minimal suture fixation, though reported complications
and recurrence remains problematic.1,2,3 The purpose of our
study is to determine outcomes for complex ventral hernia
repairs in a large cohort of patients utilizing a surgical con-
struct employing rectopectus placement of a narrow, mac-
roporous polypropylene mesh with up to 45 suture fixation
points for force distribution.

MATERIALS AND METHODS: A retrospective review
was performed for all patients undergoing ventral hernia
repair with rectopectus placement of midweight, uncoated,
soft polypropylene mesh by a single surgeon (G.A.D.)
between the years of 2010 and 2015. Patient characteristics,
surgical history, operative data, and postoperative course
were reviewed. Patients were administered a validated sur-
vey of pain and function (PROMIS).4

RESULTS: A total of 101 patients underwent hernia repair,
with a mean age of 56 years and a mean BMI of 29 m/
kg² (range 18–51 m/kg²). Patients had a median of 3 prior
abdominal operations (range: 0–9), with 44 patients present-
ing with recurrent hernias. 42 patients were VHWG grade 1,
40 grade 2, 17 grade 3, and 2 grade 4. There were no recur-
cences at a mean follow up of 14.2 months (range 5 days to 4.5
years). The SSO rate was 7.9% (3 SSIs, 2 seromas, 2 hemato-
mas, and 4 instances of delayed wound healing in 8 patients). 1
patient required reoperation for hematoma drainage. 5 patients
required readmission within 30 days. Postop patients showed
PROMIS pain interference, intensity, and behavior scores
below that of the general population, and global physical and
mental health scores on par with that of the general population.

CONCLUSION: A surgical construct employing a retrore-
ctus placement of a narrow macroporous polypropylene mesh
with up to 45 suture fixation points for force distribution can
achieve significantly better outcomes across a spectrum of
VHWG grade risk-stratified patients compared to current
strategies that employ wide meshes with minimal fixation.