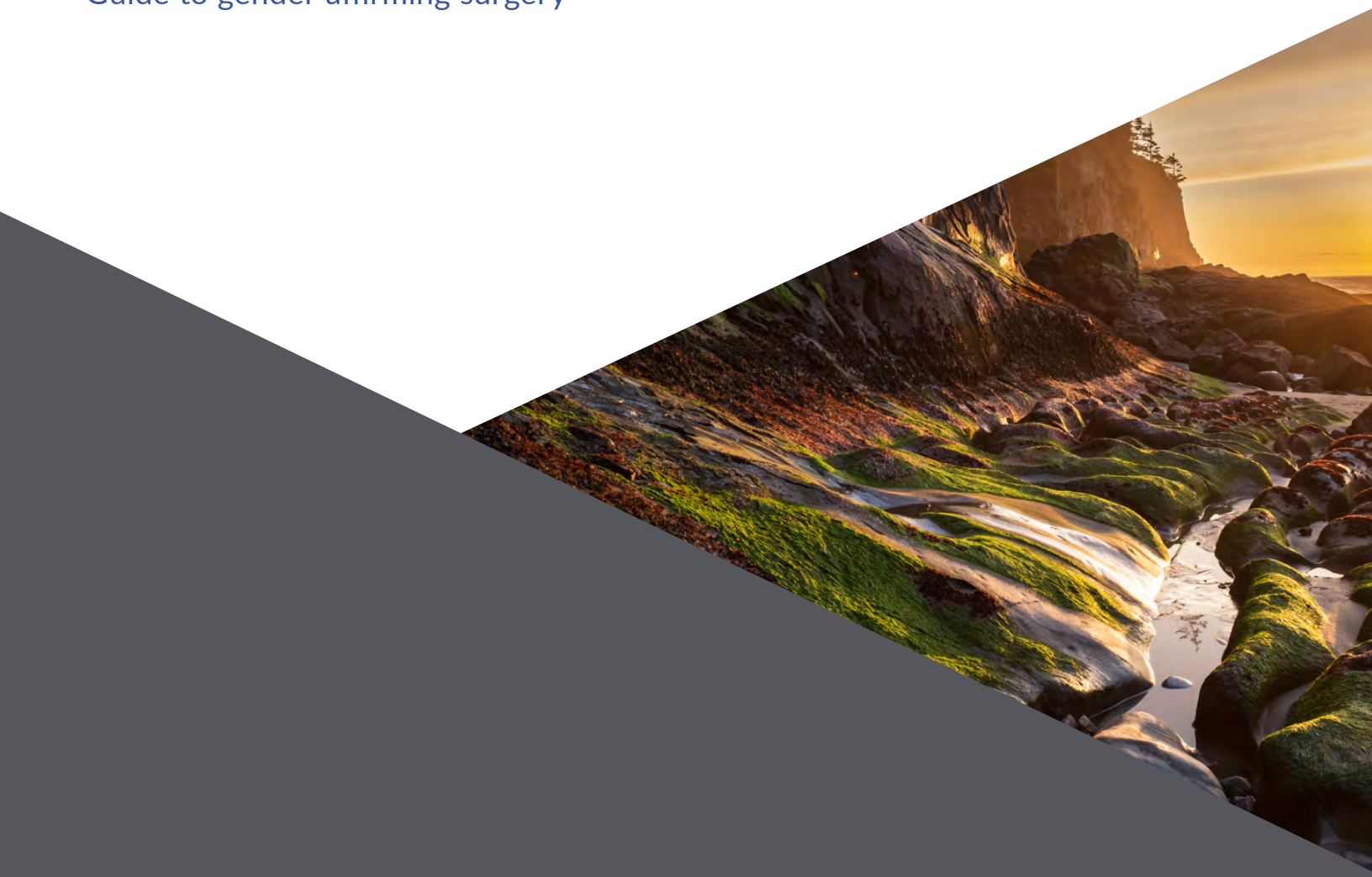
TRANSGENDER HEALTH PROGRAM

Vaginoplasty

Guide to gender-affirming surgery



OHSU

Usage statement

These patient-education materials were developed by the OHSU Transgender Health Program and the Department of Urology. They are intended to be used only for the OHSU surgical program. These materials are being updated regularly as we continually evaluate and improve the program.

Sincerely,

OHSU Transgender Health Program and Department of Urology

Materials in your booklet:

- Checklists
  - Surgery scheduling checklist
  - Preparing for surgery checklist
  - Support and recovery plan worksheet
- Letter of support template
  - Give this to your mental health provider to guide letter writing
- Transgender Health Program patient education classes
- Dilator tracking table
- Pain management research study information
- Pain management tracking table

Dr. Daniel Dugi, a urologist and surgeon, is the surgical director of the OHSU Transgender Health Program. He has extensive experience in gender-affirming surgeries, including vaginoplasty.

Section 1: Introductions

Welcome!

From the Urology Department

Welcome to the Urology Department's gender-affirming surgery division. We know you've probably waited a long time for this appointment, and we're very happy to meet you today.

Here in the Urology Department, our gender-affirming surgeries include vaginoplasty, vulvoplasty, orchiectomy and metoidioplasty. We also offer revision surgeries, and we help the Plastic and Reconstructive Surgery team with certain stages of phalloplasty.

Our team consists of:

- Surgeons
- A physician assistant
- Medical assistants
- Our surgery scheduler
- Resident physicians
- Physical therapists
- Behavioral therapists
- Social workers
- And **you**

That's right, you! We value your input, your perspective and all the work you are and will be doing to prepare for and recover from surgery. We are excited to get to know you better and to learn how we can help you.

We want to make your surgery and recovery as smooth as possible. We'll answer any questions you have and make sure you have the best possible outcome.

Preparing for and recovering from surgery is a long process with a lot of steps. We created this guide to help you navigate the process. It has three sections:

- Before surgery
- During surgery and your stay at the hospital
- After surgery

From the Transgender Health Program

Our surgery team is one part of a bigger team called the OHSU Transgender Health Program. At the Transgender Health Program, we are committed to your health and well-being. We know that high-quality health care in an affirming, welcoming environment can be lifesaving.

The Transgender Health Program — THP for short — provides support, information and advocacy, including:

Top providers: We can connect you with OHSU providers who are international leaders in caring for gender-diverse patients of all ages.

Access: We strive to increase access to health care for the transgender and gender-nonconforming communities at OHSU and beyond.

Leadership: We work with community partners to provide advocacy, to shape policies and to train health care professionals.

Classes: We offer classes on gender-affirming surgery. Classes feature slides and photos to review anatomy, genital reconstruction and surgical outcomes. Classes are free, but registration is required and available on our website. Patients, at any stage of considering surgery, are welcome to attend this class.

From pelvic floor physical therapy

All patients are encouraged, but not required, to work with one of OHSU's specially trained physical therapists before and after surgery. Physical therapists work with muscles, joints and nerves. The muscles at the base of the pelvis, also called the pelvic floor muscles, will be affected by surgery. These muscles are important because they are used for bowel, bladder and sexual function.

Before surgery:

- The physical therapist will ask about your bowel and bladder habits to better understand how your pelvic floor muscles are working. The therapist may suggest doing an exam of the pelvic floor muscles to learn more. This could be done through a rectal exam or by touching the muscles over clothing. You can choose to not have an exam.
- You may have problems such as constipation, pain, or urinary or fecal accidents. Our physical therapists will give you exercises and strategies to improve your symptoms so your recovery is easier.
- They will give you exercises and strategies to prepare for surgery.
- They will teach you things to do in the hospital to make yourself more comfortable.

After surgery:

You are encouraged to see the physical therapist after 3 weeks and after 5 weeks, and more if needed. During these appointments, your physical therapist will:

- Teach you how to relax your pelvic floor muscles to make using the dilators easier.
- Help you solve any problems related to dilating.
- Teach you how to progress to the different dilator sizes.
- Help you with any bowel and bladder function problems.
- Guide you back into exercise and your normal activity level.

Overview of vaginoplasty

We know this surgery is extremely important. It takes incredible trust to allow a surgeon to perform this operation. We want you to know we are humbled by that trust and take it very seriously.

What is vaginoplasty?

Vaginoplasty is a surgery to create the external genitalia (vulva) and an internal space (vagina). This includes a sensitive clitoris and female-positioned urethra. We use skin and sometimes peritoneum, or tissue from the inside of the abdomen, to create the vagina with a version of the "penile inversion" technique.

Expectations

- **"I want my results to look like this ..."**

  You may have been waiting your entire life for this, and you may have an image in mind of what you want your results to look like. Some people have brought in pictures from the internet of what they think results should look like. Others have told us they felt their results didn't look like a "normal woman" or "natural." We want you to be happy with your results, but we may not be able to meet 100 percent of your expectations.

- **Our surgical technique**

  Our goal is to create natural-appearing and functional female genitalia — the vagina and external parts (vulva). We use techniques we believe are as safe as possible to protect your sexual, urinary and bowel function, and look natural.

- **How will I know what my results will look like?**

  This is a complex surgery, and every person has different anatomy. Your results will be different from every other person's results. No two vulvas are alike, and no one is perfectly symmetrical. In our experience, the aesthetic results are highly related to a person's individual anatomy before surgery. We would like to match results to what you might expect in your mind's eye. But what we can realistically deliver is limited by a person's anatomy and safe surgical techniques.

What if I need a second surgery?

- We aim to create all the important structures during the main operation ("one stage"): vagina, outer and inner labia, clitoris and hood, and new urethral position.
- Whether you will need a second surgery cannot be known ahead of time. This is because of tissue swelling during surgery and the unpredictable nature of healing.
- Some well-known vaginoplasty surgeons report nearly half of patients need a second surgery to fix complications or for aesthetics. Some surgeons tell everyone that two surgeries are always necessary.
- We will submit to your insurance that we plan a two-stage operation. If you choose a second operation, hopefully it won't be hard to get insurance to cover it.

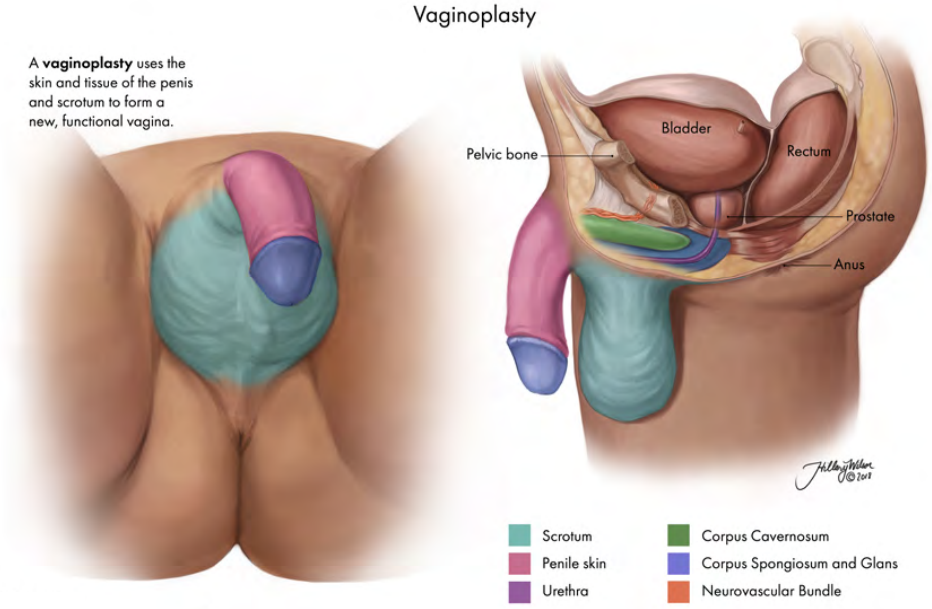
Surgery details

Initially, as a baby develops before birth, all the genital parts are the same. Through the influence of hormones, the genitalia then develop differently. Wherever possible, we will use the tissue that would have been the female part to make the new female part.

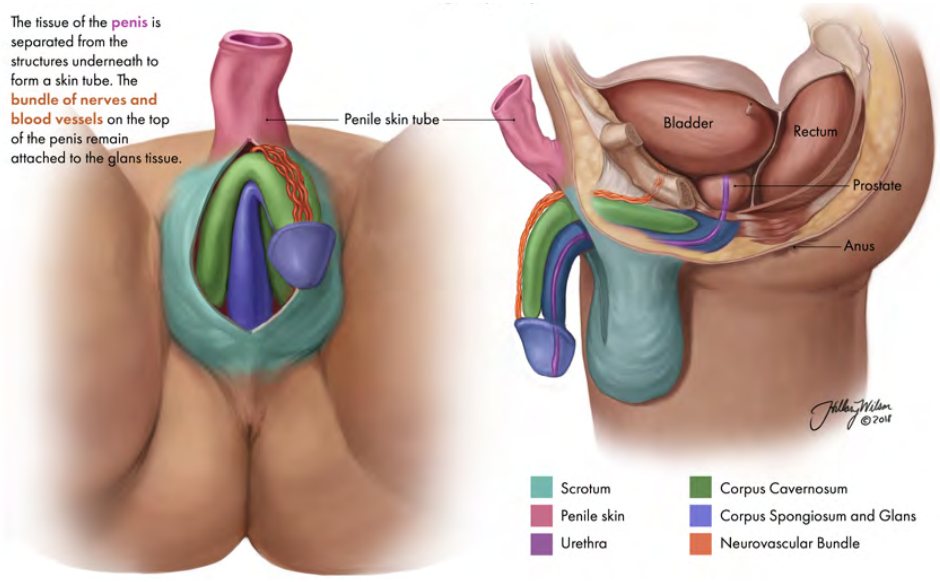
- For instance, the basic structures of the penis and clitoris are the same. The glans, or head, of the penis, with its nerves and blood supply, is used to make the clitoris.
- Skin from the penis and the urethra is used to make the area around the clitoris — the smaller or inner labia — and vagina.
- Scrotal skin is used to make the larger, outer labia. Skin from the scrotum is also used for the vagina. Occasionally, some people need to have additional skin from the lower belly to help create the vagina.

Vaginoplasty

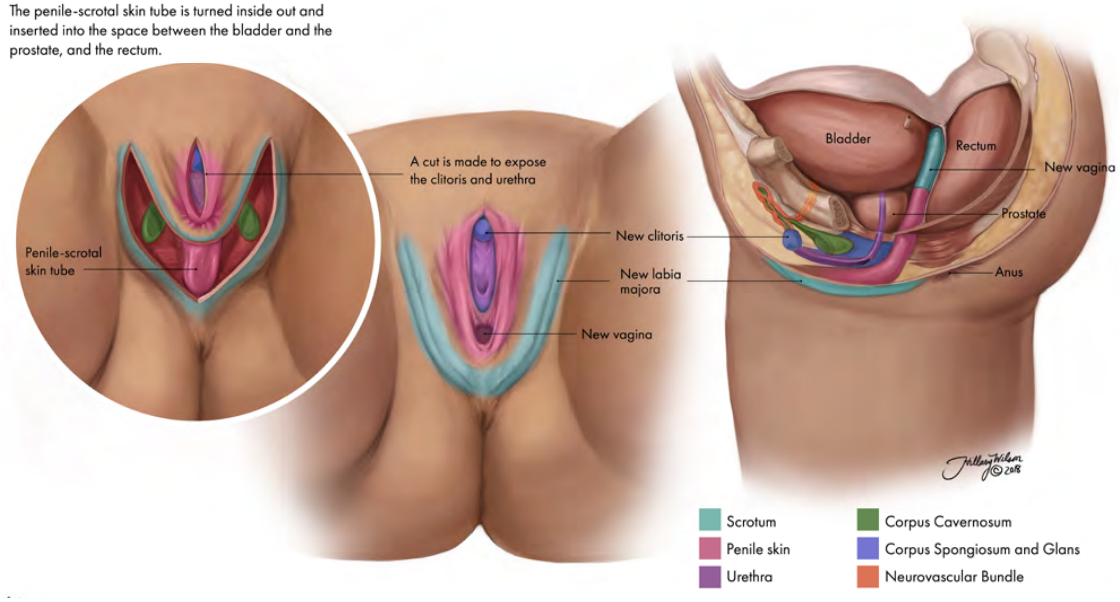
A **vaginoplasty** uses the skin and tissue of the penis and scrotum to form a new, functional vagina.



The tissue of the **penis** is separated from the structures underneath to form a skin tube. The **bundle of nerves and blood vessels** on the top of the penis remain attached to the glans tissue.



The penile-scrotal skin tube is turned inside out and inserted into the space between the bladder and the prostate, and the rectum.

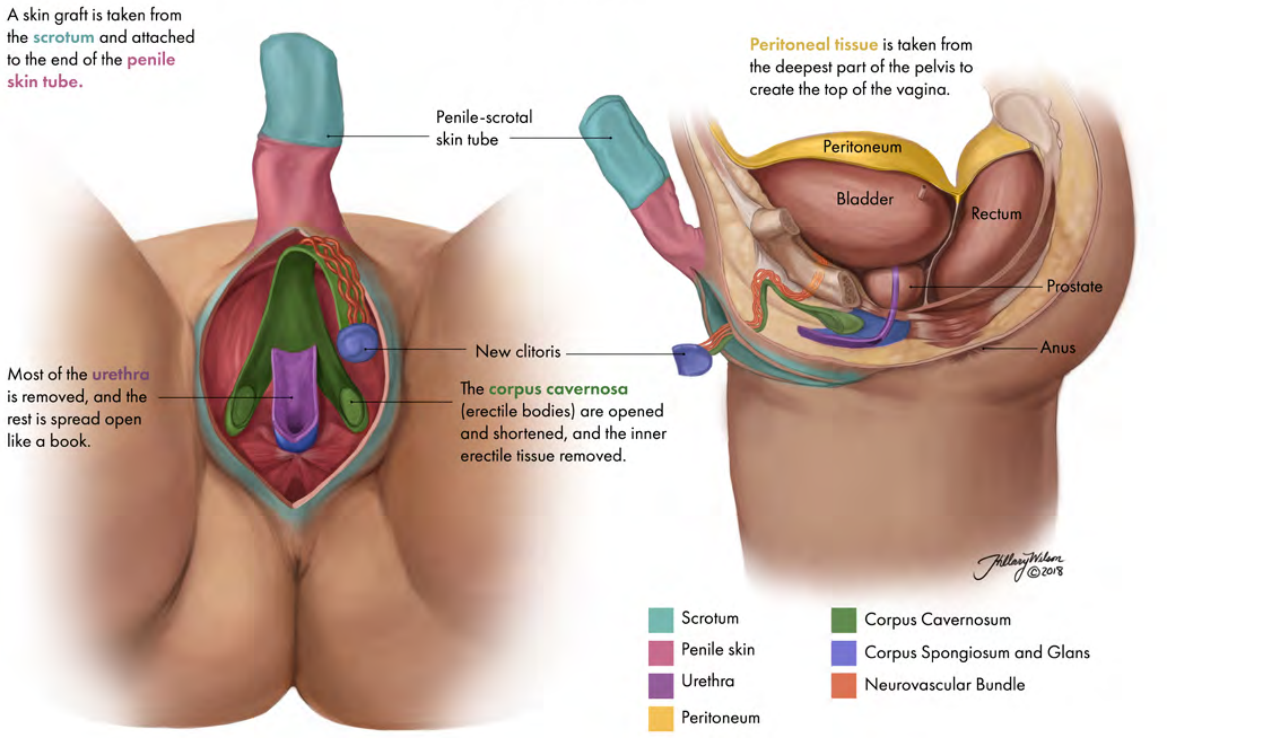


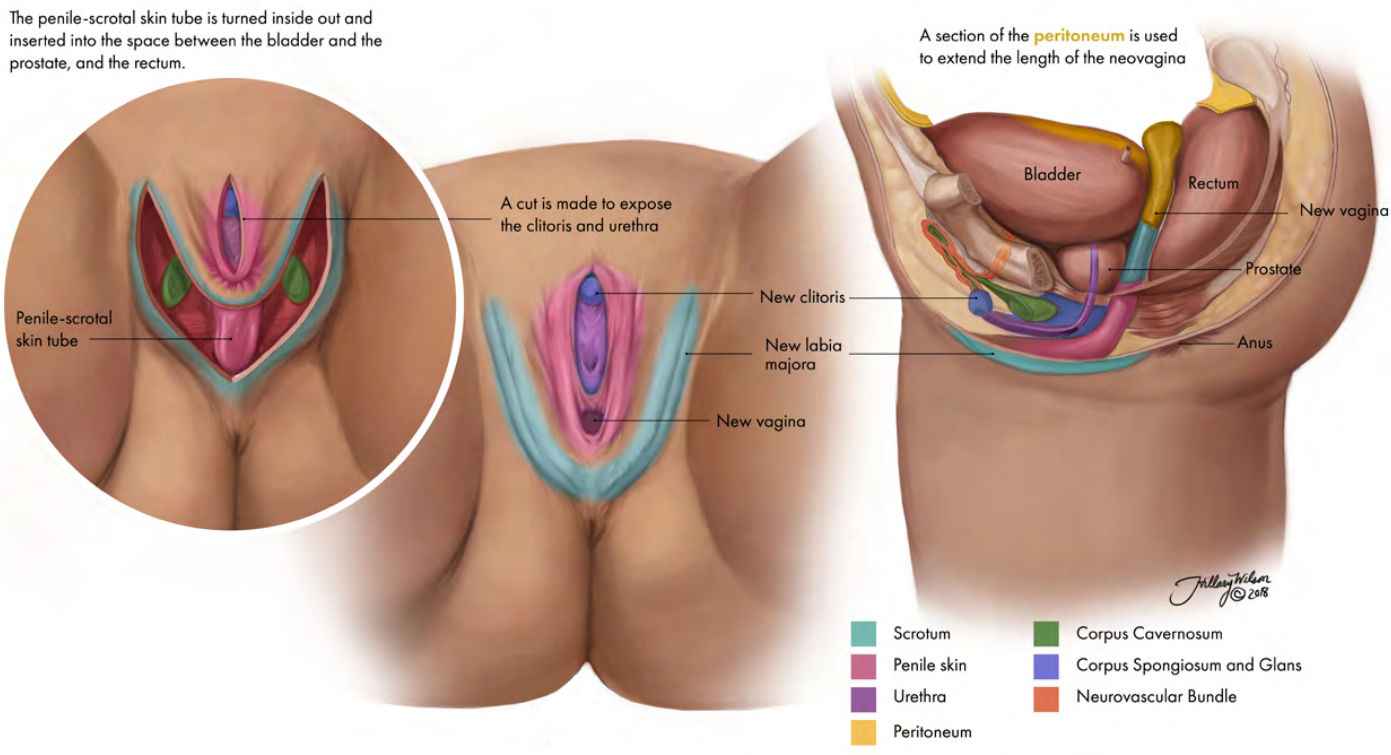
Dr. Geolani Dy and Dr. Blair Peters both perform robotic approach vaginoplasty.

Robotic approach vaginoplasty:

- The same techniques are used to create the vulva — the outer portion of your genitals.
- The robotic arms are put through small incisions around your belly button and the side of your belly. They are used to create the space for your vaginal canal between your bladder and your rectum.
- Flaps of tissue from the inner lining of your belly, or peritoneum, are used to create the top of the vagina, like a cap on top of the internal vaginal canal.
- This technique was initially developed for cisgender women born without vaginas. It has been adapted for trans women and non-binary people.
- This is the main technique used at New York University, where Dr. Dy trained and is used at a number of other centers around the country.
- Peritoneum creates some moisture but does not provide enough lubrication for intercourse or dilatation. Post-op care (including dilation) will be the same regardless of technique.
- Both open and robotic approach vaginoplasties are a one-stage operation. That means we aim to create all the important structures during the main operation: vagina, outer and inner labia, clitoris and hood, and new urethral position.

Vaginoplasty





Serious complications are uncommon. But choosing to have surgery is choosing to accept that risk. We do everything we can to minimize the risk of complications during and after surgery.

Risks and complications

Wound-healing complications

Wound separation: This is one of the more common complications after surgery. Wound separation happens where we have stitched two areas of skin together, but the skin edges pull apart after surgery. This typically heals on its own if you keep the site clean and dry. If you have wound separation, we will ask you to change your dressing with roll fluff gauze every time you use the bathroom or take a shower.

Granulation tissue: This is an area of bright red or pink tissue around an incision where healing wasn't complete. It can sometimes show up as painless bleeding or spotting. This is quite common. We can treat this easily in the office at your follow-up appointment.

Tissue necrosis: This sounds scary but is usually minor. It is another more common complication. Tissue necrosis happens when there is not enough blood to supply healing tissue. If you have tissue necrosis, we will ask you to change your dressing with roll fluff gauze every time you use the bathroom or take a shower. If this results in unsatisfactory functional or cosmetic outcomes, we can usually fix it with a second surgery.

Graft failure: Total graft failure happens in less than 1 percent of cases. We would have to perform a second surgery to correct it. More often than not, small areas of the graft may fail. They typically resolve on their own without any procedures or further complications.

Urinary complications

Urine spraying: One-third of people in published studies report this complication. Patients often find that it can take more than 6 months before the urine stream is more directed. If you still have bothersome urine spraying after 6 months, we can often correct it with a second surgery.

Urine retention: About 1 in 5 people have difficulty emptying their bladder after the Foley catheter is removed in the hospital. If this happens, a nurse will replace the catheter. We will remove it at your first follow-up visit.

Urinary urgency/frequency: This is a feeling of having to pee suddenly and often. This is common soon after surgery because of bladder irritation. This typically resolves on its own.

Urine leakage: This can happen without warning. But it usually happens when pressure increases in the abdomen, such as with coughing, laughing or sneezing. This usually gets better on its own as you heal. Pelvic floor physical therapy can help.

Surgery risks

Infection: Infections after surgery are uncommon but can be dangerous. The area we operate on tends to have a lot of bacteria, which increases the chance of infection. The risk of infection is higher for people who have diabetes or are overweight. You will be given antibiotics at the time of surgery to prevent infection. But we ask that you shower twice daily and keep the area clean and dry. If you have diabetes, be diligent about checking and correcting your blood sugar. The stress of surgery can make it more difficult to control blood sugar.

Hematoma: This is localized bleeding outside blood vessels. If you develop a sudden, asymmetric swelling and/or bruising at the surgical site, you may have a hematoma. Small hematomas typically heal on their own. Large hematomas may need to be drained, but this is rare. Remember, you will have a lot of swelling at the surgical site. This is normal, but sudden asymmetric changes are not.

Blood clots (sudden swelling of one leg or difficulty breathing): Blood clots can form during and after surgery because of prolonged inactivity. If you take oral estrogen, we ask that you either stop taking your estrogen two weeks prior to surgery or switch to topical or injectable estrogen about four weeks before surgery. This is to help prevent blood clots. We also put squeezing devices on your legs while you are in the hospital to prevent this. When you go home, getting up and moving around periodically will help prevent blood clots. If one of your legs swells suddenly, or if you suddenly have a hard time breathing, you may have a blood clot. You should go to the Emergency Department immediately.

Risks specific to vaginoplasty

Vaginal stenosis (narrowing): Extreme narrowing of the vaginal canal is rare in patients who dilate three times a day for 30 minutes each time. More often, we see this in patients who struggle with dilation for some reason. Pelvic floor physical therapy can teach you to relax your pelvic floor muscles to make you more successful with dilation. If you develop vaginal stenosis or canal shortening, a second surgery is often required to fix it.

Rectal injury: Because we are creating a space for the vaginal canal very close to the rectum, there is a chance of injuring the rectum during surgery. This is a small risk. If it happens, we will repair it at the time of surgery. It should not cause any further complications.

Fistula: Even more rarely, an unwanted connection can form between the vagina and rectum. This has happened in fewer than 1 percent of our cases. If it does happen, it is serious and requires another major surgery. If you see fecal matter (poop) coming from the vagina, you may have a fistula and should tell us right away.

Section 2:
Before surgery

Surgery scheduling checklist

After your first appointment, we have no way of knowing if you are ready for surgery until you tell us you've finished all the preparation steps. We have created a checklist to help you. All items need to be complete before surgery can be scheduled.

Things to do (and send us) to be eligible for surgery scheduling

- ◯ Complete and return support and recovery plan worksheet (included).
- ◯ Two letters of support (one dated one year before surgery)
  - ☐ Written by certified mental health providers.
  - ☐ Following WPATH criteria.
  - ☐ Please visit the Transgender Health Program website (ohsu.edu/transgender-health) for more information about mental health referrals and/or to give your provider our WPATH letter template.
  - ☐ Contact the Transgender Health Program if you need help connecting with a mental health professional.
- ◯ Your health plan (insurance) requires one of your two letters of support to be dated within 1 year of your surgery.
- ◯ Documentation that hair removal is 80% complete
- ◯ Documentation of recent A1C < 6.5% (diabetic patients only)
- ◯ Successful nicotine cessation
  - ☐ OHSU tests for nicotine between 4 and 8 weeks before surgery. You need to be free of nicotine in all forms at least 2 weeks before this test.

- We kindly ask that as you complete items on the checklist, you contact us to let us know and/or send in the required documentation.
- Once we have documentation that the checklist is complete, we can schedule your surgery. You can call the clinic to find out what we have on file and what we still need.

Support and recovery plan worksheet

We hope this worksheet helps you prepare for recovery. You will receive a copy of this form to turn in.

Your name: _____ Date of birth: _____

HOUSING: You will need to have stable housing for the first 6 weeks after surgery. This should be a place that is physically and emotionally safe. If you are having vaginoplasty, you should also have a comfortable, private space where you can perform dilation for 30 minutes, 3 times per day.

Do you currently have stable, safe housing? ☐ Yes ☐ No

What is your plan for stable, safe housing during recovery from surgery?

- ☐ Your own home
- ☐ A friend or family member's home
- ☐ Hotel
- ☐ Rood Family Pavilion *(your reservation has been accepted and confirmed)*
- ☐ Other (please specify): _____

_____

SUPPORT: You will need to have someone who is physically present to help you with day-to-day activities for at least several hours a day for a week after surgery.

Do you have a "support person or team" — someone(s) to assist you in aftercare? ☐ Yes ☐ No

Is your support person(s) available to be with you for several hours or more for the first week after surgery?

☐ Yes ☐ No

Please check all the ways your support person(s) is prepared for your recovery:

- ☐ **Transportation:** Take you to and pick you up from the hospital, help you get to follow-up appointments
- ☐ **Food:** Grocery shopping, meal preparation, food cleanup
- ☐ **Hygiene/wound care:** Someone to help you to the bathroom, with showering and simple wound care
- ☐ **Supplies/errands:** Picking up supplies such as medications or other household items
- ☐ **Household chores:** Laundry, housecleaning, taking out the garbage, checking the mail
- ☐ **Dependent care:** Someone to help with any responsibilities you have to provide child care, care for pets or other caregiver duties
- ☐ **Companionship:** Someone to keep you company so you are not isolated or lonely during recovery

Please provide the contact information for your support(s):

Name: _____ Phone number: _____

Name: _____ Phone number: _____

You should have a backup support in case the person named above is unavailable to assist you as planned. Please provide the contact information for your backup support person(s):

Name: _____ Phone number: _____

FINANCIAL PLANNING: If you are working, are you able to take up to 4 weeks, or possibly more, time off from work to recover from surgery?

☐ Yes ☐ No ☐ Unsure

Please check all the ways you are financially prepared during recovery by indicating you have money set aside or expect your usual income for:

- ☐ Rent/mortgage
- ☐ Food
- ☐ Phone and other utilities
- ☐ Medication/medical supplies
- ☐ Transportation
- ☐ Other bills (credit cards, insurance premiums, school loans, etc.)

SOCIAL WORK SUPPORT: Are you interested in speaking with a Transgender Health Program social worker to assist with any of the following?

- ☐ Housing
- ☐ Social support
- ☐ Finances
- ☐ Mental health
- ☐ Other (please specify): _____

_____

Please return this worksheet to us via email to urologyTHP@ohsu.edu as a PDF or JPEG or fax to 503-346-1501.

The Transgender Health Program does not consider being transgender or gender-nonconforming a disorder or diagnosis. Instead, we recognize that mental health professionals can offer support and guidance. They can also provide the **letters of support** needed for some surgeries.

Amy Penkin, the Transgender Health Clinic Program Manager, has led the program since it began in 2015. She has a long history of serving the LGBTQ community.

Finding a mental health therapist

Transgender Health Program services: The THP offers psychological services for shorter-term assessment and support, including providing letters of support. We can also help you find a therapist in the community if you're interested in ongoing care.

Searchable database: *Psychology Today* maintains a Find a Therapist tool at psychologytoday.com/us/therapists. You can click on your state and filter by ZIP code, specialty area (such as transgender care) and type of insurance, such as the Oregon Health Plan.

Letters of support

Why do we require two letters of support?

We follow the World Professional Association for Transgender Health (WPATH) Standards of Care (wpath.org/publications/soc) guidelines. This requires that you have two letters in support of your transition surgery written by mental health providers before scheduling surgery. Insurance also requires these two letters. Many insurance companies will not cover the cost of surgery without them.

The requirement for letters of support is not meant to be a barrier or burden, or to be stigmatizing. We understand it's an insurance requirement. We also see the value of making sure people have considered all the implications of a major, irreversible surgery on their identity, physical health, sexual function and fertility. Also, surgery and recovery from surgery are part of an extremely stressful time. It's important to have a relationship with someone who can help with that stress if needed.

Do the letters ever expire?

Insurance often requires that at least one letter be dated within 1 year of surgery. Current waiting times for surgery mean you may need one or both letters updated about 3 months before surgery. We apologize for any inconvenience. We are always working to improve this process and to reduce waiting times.

Who can write the letters?

Only a certified, qualified mental health provider can write the letters of support. Your primary care provider cannot write the letter. Here are some examples of mental health professionals who can write your letter:

- Licensed clinical social worker (LCSW or LICSW)
- Licensed Marriage and Family Therapist (MFT)
- Licensed social work associate & independent clinical (LSWAIC)
- Licensed Professional Counselor (LPC)
- Clinical psychologist (Ph.D. or Psy.D.)

What must be included in the letters?

WPATH recommends the letters contain:

1. The client's general identifying characteristics.
2. Results of the client's psychosocial assessment, including any diagnoses.
3. What surgery or surgeries the patient is seeking.
4. How long the patient has been on hormone therapy and living in a gender role.
5. The duration of the referring health professional's relationship with the client, including the type of evaluation and therapy or counseling to date.
6. An explanation that the criteria for surgery have been met, and a brief description of the clinical rationale for supporting the patient's request for surgery.
7. A statement that the patient has given informed consent.
8. A statement that the referring health professional is available for coordination of care and welcomes a phone call to establish this.

Make sure your certified mental health professional is familiar with the WPATH Standards of Care and includes all of the above information. Consider giving the person these guidelines to help in writing your letter.

Is there a template that my mental health provider can use to write the letter?

Yes! We made a template that your mental health professional can fill out and mail or fax to us. Find it on the THP website at ohsu.edu/transgender-health/patient-guide-gender-affirming-care, under "Letters of support."

Where do I or my mental health professional send the letters?

Please fax, mail or email a PDF of the **signed** letters to us at:

OHSU Department of Urology
3303 S.W. Bond Ave., 10th floor
Portland, OR 97239
Phone: 503-346-1500
Fax: 503-346-1501
Email: urologyTHP@ohsu.edu

Nicotine cessation, diabetes control and weight loss

Stopping smoking/nicotine

Why is it important?

Nicotine is a powerful drug that constricts your blood vessels and decreases blood flow to the tissues we are operating on. This can cause complications, including poor wound healing, delayed wound healing and graft failure. Research shows that risk of surgery failure increases 10 times for people who smoke even 1 cigarette a day.

How long do I need to be nicotine free?

We require that people not smoke or use any nicotine or tobacco products for at least 6 weeks before surgery.

What about nicotine patches, gum, e-cigarettes, etc.?

All of these products are a healthier alternative to smoking tobacco, but they all contain nicotine. They have the same negative effect on wound healing. Therefore we require that you not consume any of these products for 10 weeks before surgery

How do you test for nicotine?

You will take a blood test as part of your appointment about 4 weeks before surgery. This test can detect nicotine use within several weeks before. Secondhand smoke can also cause you to test positive, so it's important to avoid it for 10 weeks before surgery. We also test for nicotine on the day of surgery to make sure you remain successful in stopping nicotine in the month before surgery.

What resources are available to help me quit using nicotine?

- Your primary care provider can prescribe nicotine replacement such as patches and gums, or connect you with behavioral health services.
- If you are interested in tobacco cessation groups, please contact the Transgender Health Program or look online for groups in your area.
- Consider the Oregon Tobacco Quit Line, open 24/7, at **1-800-QUIT-NOW** (800-784-8669) or quitnow.net/oregon. These resources may refer to tobacco, but they may help with quitting nicotine in any form.

What about marijuana?

If you use cannabis, please do not smoke for at least 4 weeks before surgery. That will help you avoid the carbon monoxide poisoning from inhaling any type of smoke. It is better to use edibles and other forms of cannabis. Though no studies show cannabis use is safe in surgical recovery, especially when combined with narcotic pain medication, we do not prohibit it or test for it. Please be cautious.

Controlling diabetes

Why is it important?

People with diabetes may have greater risk of poor healing and infections, especially if their diabetes is not well controlled. Your primary care provider or endocrinologist can help you make sure your diabetes is under control before surgery.

What are the requirements for surgery?

A test called hemoglobin A1C (HbA1c) can help show what your blood sugar control has been like over the past 3 months. At the time of surgery, your HbA1c should be 6.5 or less.

Weight loss

We understand that beauty comes in all shapes and sizes. You don't have to be skinny to be healthy. "Ideal body weight" is a medical term for the weight associated with the lowest mortality for your height, frame and gender. Online calculators can help you determine your ideal body weight.

Why is my weight important?

You will have the best result from surgery if you are as close as possible to your ideal body weight. Structures such as the clitoris, urethra and vagina have to be placed near the pelvic bones. If you are obese, they will be more buried by the extra tissue, just like in cisgender women. But more important, it will be much more difficult to make the vagina. This is because the heavier a person is, the farther away skin is from the opening of the new vagina. It can be difficult to have enough skin to cover the new space.

If we don't have enough skin from the penis and scrotum, we will have to take tissue from other areas of the body. Being severely overweight also increases your risk of complications such as breathing problems, infections and blood clots in the legs and lungs.

What is the cutoff?

Some surgeons use a strict number to determine who can have surgery using body mass index (BMI).

BMI is calculated based on a ratio between your height and weight. We believe individual variations in how body fat is distributed are more important than BMI.

Dr. Dy has a BMI cutoff of 35. While Dr. Dugi does not use a strict cutoff, we think people have the best results when the BMI is less than 35. We have performed only a few vaginoplasties for people with a BMI over 40. You can use OHSU's BMI calculator at apps.ohsu.edu/health/body-mass-index.

What resources are available to help me lose weight?

Contact your primary care provider to discuss healthy ways to lose weight. Your provider might be able to refer you to a nutritionist, dietitian or gym. Some prescriptions can help with weight loss when used with exercise and a healthy diet. We like to reserve weight loss surgery for a last resort because certain abdominal surgeries can make our surgery more difficult. But we have recommended patients look into this option. We have operated on patients after successful weight loss surgery.

Hair removal guide and FAQ

Why do I need hair removal for vaginoplasty?

The skin of the penis and the scrotum are used to make the new vagina. To avoid having hair inside the new vagina, it must be permanently removed. Hair remaining inside the new vagina can lead to hygiene problems, discomfort during dilation and intercourse, and a less desirable appearance. Having a few hairs is generally not a problem. But there are no good options for removing hair from inside after surgery. Some surgeons offer hair removal (electrolysis or "follicle scraping") in the operating room. We do not believe these are reliable ways of removing hair from the skin used to make the new vagina.

How do I get my insurance to cover the cost?

Generally, insurers require that you consult with your surgeon before they'll cover the cost of hair removal. This can be variable and some payers may allow for pre-consult hair removal while others may require you to have your two mental health letters of support for your surgery before hair removal will be authorized. We recommend you work with your health plan and hair-removal provider to get updated information about scheduling hair removal. We will provide you with a letter of medical necessity you can give to your insurance company. If you are interested in seeing someone in the OHSU Transgender Health Program, we can refer you.

Where can I get hair removed?

We have included a list of hair-removal providers in your booklet, based on feedback from patients. We do not specifically endorse any providers outside the OHSU Transgender Health Program. But we want to give you options that may be easier for you to access.

How long does hair removal take?

Hair removal can take 6 months to more than a year. It may take several months to get a first appointment with certain providers who take your health insurance. In some cases, that means hair removal can take almost 2 years. But everyone is different, and these time estimates can vary greatly. Laser treatment tends to be faster, but it will not work on all skin types and hair colors. And you will have to factor in enough time to be sure results are permanent.

What areas need to be hair free?

- Scrotum
- Beneath the base of the penis
- Between the thigh creases
- The perineum (space between the scrotum and 1 inch above the anus)

We've included a hair removal diagram showing the areas that must be free of hair. Show it to your provider.

What's the difference between electrolysis and laser, and how do I know which is best for me?

	ELECTROLYSIS	LASER
How it works	Uses electricity delivered to hair follicles to stop new hair from growing.	Uses heat and light to damage the hair follicles.
Will it work for me?	Works on all skin types and hair colors.	Since laser targets the pigment in the hair, it typically works best for people with dark hair and light skin. It's not as effective on blond, gray or red hair.
Is it permanent?	Yes.	Not always; laser generally makes the hair lighter and thinner, but people often have follow-up treatments or even change to electrolysis.
How long does it take?	Electrolysis sessions take longer because each follicle must be treated individually.	Laser sessions are relatively quick because the laser targets a general area.
Cost comparison	Costs more than laser.	Costs less than electrolysis.
Pain	Typically bearable, but the groin is a sensitive area, and everyone has a different tolerance.	Typically more painful, but sessions don't last as long.
Preparation required	Hair needs to be unshaven and about 1 millimeter long.	Must shave before each session.

How do I know when I am done with hair removal?

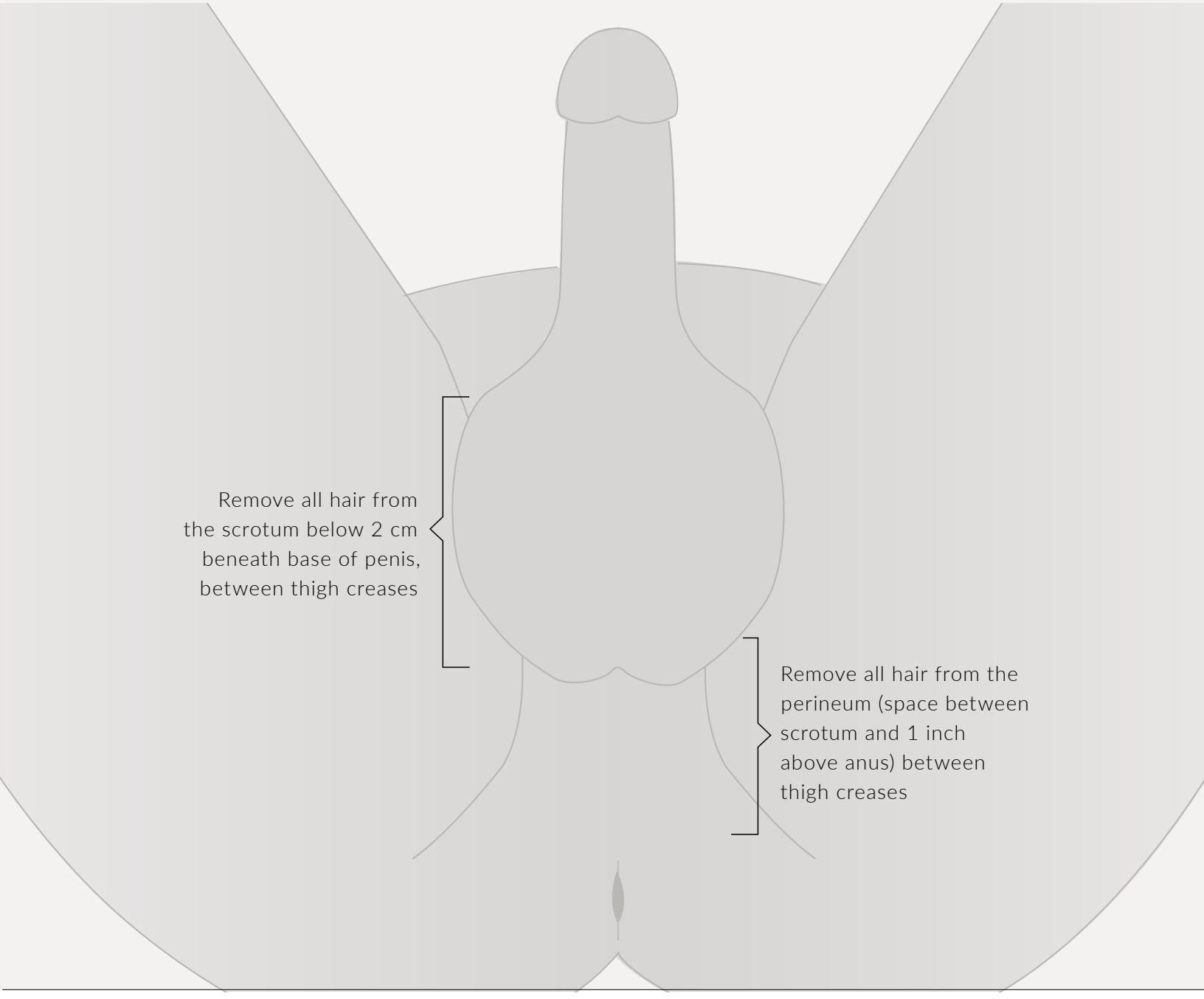
It is impossible for us to determine at any one point if your hair removal will be permanent. This is because each of your hairs is always in a different stage of growth. Some hairs may be inactive, or not growing now, then growing a month later. The best approach for a good result is to discuss this with your electrolysis or laser provider. Go through several cycles with the area completely cleared followed by waiting 4–6 weeks. Then wait 3–6 months to see if you have significant regrowth.

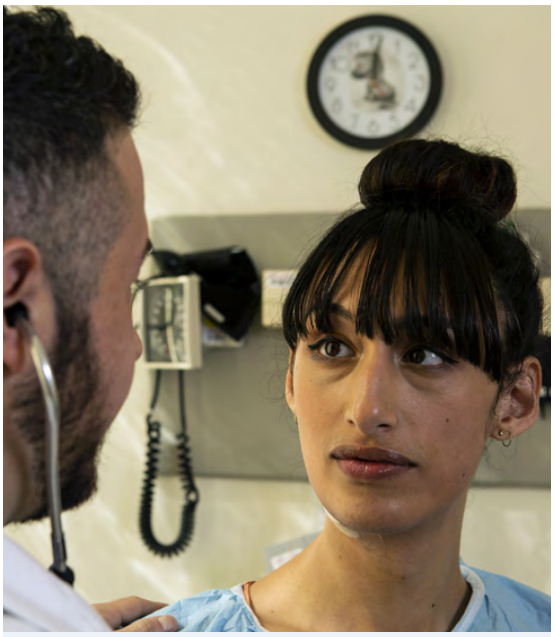
It is your decision and responsibility whether to have surgery with the level of hair removal you have completed. Once the skin is on the inside, there is no effective way to remove the hair!

Permanent hair removal prior to vaginoplasty

Skin of the scrotum and the space behind the scrotum could be used to make the vagina. Remove all hair between the thigh creases.

If you wish to keep hair on the outer labia, discuss this with your surgeon for more information during your consultation.





The Gender Spectrum Collection

These appointments will be held when you are scheduled for surgery. We do our best to schedule them on the same day and around the same time so you only have to make one trip.

Pre-surgery appointments

Urology Department

About 1 month before surgery, you will return to the Urology Clinic on the 10th floor of the Center for Health & Healing Building 1. You'll meet with our physician assistant, Dorian Scull. This appointment will give you the chance to ask any last-minute questions before surgery. It can be easy to forget what questions you wanted to ask, so make a list. Be sure to bring:

- A list of last-minute questions
- A list of any recent surgeries
- A list of any recent changes to your medical history
- Family Medical Leave Act paperwork, if you have any

Preoperative medicine

This appointment is for tests (including a nicotine test) to check on your general health. We will also tell you what medicines to take or not take before surgery. Be prepared:

- Bring an updated list of medications you're taking
- Bring a list of any recent surgeries
- Be nicotine free
- Come hydrated for a blood draw

If you are taking oral estrogen, we recommend you switch to another form of estrogen 2 weeks prior to surgery. You do NOT need to stop taking spironolactone or progesterone before surgery.

Pelvic floor physical therapy

You'll need to learn to relax the pelvic floor muscles surrounding your new vagina. That will allow dilation or sexual activity.

You will meet with a physical therapist who specializes in pelvic floor muscles and works closely with us and our patients. You will meet with the physical therapist about 1 month before surgery and again 3 weeks after surgery to maximize your success.

On the first visit, the physical therapist will talk with you about your general health and pelvic muscle health. This includes questions about bowel and bladder function, any pain issues or any history of trauma. If you are comfortable with it, the physical therapist will do a pelvic muscle exam. The exam is optional. It can provide important information about how your pelvic muscles work and what physical therapy can improve to make dilation easier. The physical therapist will discuss exam options with you. These include looking only at muscle contractions and relaxation, touching the muscles on the outside, electromyography biofeedback or rectal exam of the muscles. You can choose which, if any, methods are used.

What you'll be asked about:

- Urination problems
- Bowel movement problems
- Any pain
- Any history of trauma
- Pee, poop and genital issues
- A pelvic muscle exam

Tell us if you don't feel comfortable with any suggested parts of the exam. We want you to be totally comfortable. We can still achieve a lot if you prefer to keep your clothes or underwear on, or if you prefer not to be touched on certain parts of your body.

Questions: OHSU Rehabilitation Services, 503-494-3151.

Preparing for surgery checklist

We created this checklist to guide you in preparing for surgery. Check off the boxes as you complete the items to make sure you don't miss any important preparations.

What to do after you are scheduled and before your surgery

- ◯ Complete hair removal (vaginoplasty only)
- ◯ Continue nicotine cessation
  - ☐ You will be tested about 1 month before surgery and on the day of surgery
- ◯ Keep diabetes under control (if applicable)
  - ☐ You will have an A1C test about one month before surgery
- ◯ Finalize time off from work/school/volunteer work (if applicable)
  - ☐ You will need to request 6–8 weeks off
- ◯ Finalize details of post-surgery care plan:
  - ☐ Confirm care team and assign roles to caregivers
  - ☐ Maintain safe, stable housing
  - ☐ Have a ride to and from the hospital
  - ☐ Have some money saved to help with expenses (supplies, food, copays, transportation, unforeseen expenses)
- ◯ Start State Disability Insurance paperwork and bring completed Family Medical Leave Act paperwork to appointment 1 month before surgery (if applicable)
- ◯ Attend your 3 pre-surgery appointments (we try to schedule these on the same day) 1 month before surgery:
  - ☐ Urology Department appointment
    - ☐ Bring FMLA paperwork (if applicable)
  - ☐ Pelvic floor physical therapy appointment
  - ☐ Medical appointment for tests, including nicotine test
- ◯ Buy recommended supplies (see list in your booklet)
- ◯ Read through what to expect during your hospital stay and reread discharge instructions
- ◯ Clean house, do laundry, create easy pathway to bathroom
- ◯ Meal prep (cook and freeze meals)
- ◯ Pack hospital bag (see suggested items in your booklet)
- ◯ Finalize ride to the hospital the day before (this will be a very early morning)
- ◯ Practice stress reduction exercises

Supplies to get before surgery

Roll fluff gauze: Gauze helps absorb drainage and discharge after surgery. The gauze helps absorb that drainage. It keeps the wound clean and dry, prevents infection and protects your underwear. It is especially useful if you have any areas of wound separation that need a little extra attention. We recommend buying about 10 rolls. You can buy them on Amazon.com for about $1 a roll. Search for "fluff gauze roll."

Donut pillow: Sitting, even for short periods, can be very uncomfortable after surgery because it puts pressure on the surgical site. Some patients have found that sitting on a donut pillow, hemorrhoid pillow, U-shaped neck pillow or "portalee gel seat" makes this more comfortable.

Maxi pads: Pads can help with drainage or a small amount of old blood that leaks from the surgical site for a while after surgery. You may have to use large maxi pads as needed at first. Putting a maxi pad in a snug pair of underwear can put a little pressure on the site. That can help with swelling, but it should not be too tight. You can switch to smaller pads as the drainage slows.

Water-based lubricating jelly: At your first follow-up visit, you will be given your set of vaginal dilators and a hand mirror to help you see the area. You will need lubrication to perform dilation. Since you will dilate the vagina 3 times a day for at least the first 6 weeks, you will need to have a good supply of water-based gel lubricant. This does not need to be surgical grade but should not be a thin or runny sensual lubricant. Once you start back to work or school, you can decrease the frequency of dilation to twice a day. Other sections of your booklet have more information about dilation.

Mild, unscented soap: The only wound care that you will likely be doing when you leave the hospital is showering twice daily. This will keep the surgical site clean and dry and reduce the risk of infection. We recommend washing with a mild, unscented soap. Something designed for sensitive skin that will be gentle on healing tissue.

Toilet paper: You are likely to spray urine after surgery. This can be messy, so you will want a large supply of toilet paper for wiping.

Extra pairs of loose or mesh underwear: With dressing and maxi pads, your regular underwear may be too tight. You also may have some drainage that might ruin your underwear. For this reason, we recommend having loose-fitting, inexpensive underwear on hand.

Stool softeners: Your opioid pain medication and inactivity will likely cause some constipation. You may want to have some extra stool softeners to prevent constipation. We recommend a gentle, nonstimulant stool softener such as polyethylene glycol (brand name Miralax).

Ice pack: Keeping the surgical site cool can reduce swelling, inflammation and pain. Using an ice pack on top of a towel can help.

Paper towels: These can help with cleaning up after dilation, putting under ice packs and general cleaning.

Absorbent bed pads (chux): Dilating can be messy because you will use a lot of lubrication and will have some discharge and drainage. Sitting on a bed pad when dilating can keep your bedding or upholstery clean. Puppy training pads also work. You can also use a towel, which is cheaper, but it must be cleaned regularly. Old towels, sheets or blankets will also work, and will help cut down on plastic waste in our landfills.

Peri bottle: For the first few weeks after surgery, shower twice daily with gentle soap and water. Use your hand rather than a washcloth to clean the surgical site. Some patients find a peri bottle, designed for postpartem mothers, to be a gentle way to clean the vagina after surgery, in addition to showering twice daily.

Packing your bag for the hospital

Here's a list of things you'll need during your hospital stay. Remember that you will be in bed for 5 days after surgery. That may sound nice, but it can be uncomfortable and boring. You will get regular meals you can order from our cafeteria, but bring snacks for between meals.

What to bring:

- ☐ ID
- ☐ Paperwork
- ☐ Payment method
- ☐ Comfortable, loose-fitting, low-hassle clothes
- ☐ Items that make you comfortable
  - ☐ Favorite blanket, pillow, aromatherapy, eye pillow, massager
- ☐ Items that keep you entertained
  - ☐ Games, music, books, puzzles
- ☐ Chargers for electronics
- ☐ Snacks

What not to bring:

- ☒ Valuables, including jewelry

Food and drink restrictions

- Only clear liquids the entire day before surgery. Examples: Jell-O, Gatorade, coffee (no cream), broth.
- No food or drink starting at midnight the night before surgery. It's OK to take small sips of water with medications.

Section 3:
During surgery and your hospital stay

Preventing lung infections

Your nurse will give you an incentive spirometer and teach you how to use it. This helps you open up your lungs and prevent infection. Try to use this 10 times an hour when awake.

Hospital welcome and tip sheet

Surgical unit welcome and tips

Welcome to the inpatient unit at OHSU. Our patient population consists of kidney and liver transplant, urology and reconstructive surgery patients. We also care for all gender-affirming surgery patients who need to stay in the hospital after surgery.

Who's who?

Providers: These are your surgeons, surgical residents, physician assistants and nurse practitioners. They do your surgery and/or create the pathway for your recovery. They visit you daily to answer your questions, see how you are doing and make changes to your plan, if needed.

Registered nurses: These are the people you see the most during your stay. They bring your medications, monitor your recovery and help you stay comfortable. They check in on you throughout the day and night. The more we know about how you feel, the better we can help you. The nurses can answer questions about your plan and recovery.

Certified nursing assistants: Nursing assistants check your vital signs (temperature, blood pressure, heart rate, etc.) periodically. They check on you throughout the day and night. You can ask them about how to get comfortable, for water or snacks, or for help if you need to go to the bathroom.

Room service attendants: These people bring your food and take away your tray.

Medications

You will have 2 sets of medications:

Scheduled: Your providers order these medications to be given on a schedule. Your nurse will bring them to you at a set time each day (typically 9 a.m. and 9 p.m.).

As needed: These medications, also called PRNs, are given to you when needed to make you more comfortable — for example, if you have breakthrough pain, sore throat, gas pain, bladder spasms, constipation or heartburn. If you have any of these symptoms, tell your nurses and they can give you a medication that should help.

Eating

It's important to eat what you have an appetite for. We also have a few recommendations:

- Protein is important for healing. Protein can be found in meat such as chicken, fish, pork and beef. Nuts, whole grains, beans and legumes are also good sources.
- Since you are in bed and not up moving around like normal, your bowels will slow down. Stay away from heavier foods (fried, greasy, etc.) because they are harder to digest and may lead to gas pain.

To order food, call **4-1111** from your room phone. Delivery usually takes about an hour, so call before you get too hungry.

Toileting

You will use a bedpan to have a bowel movement. This can be intimidating for some people, but it happens in hospitals all the time, so don't worry!

Practice makes perfect: It's a good idea to practice sitting on the bedpan before you have to go so you know what to expect.

What about urinating? You will have a catheter (tube) draining your bladder, so you shouldn't feel the need to pee. If you feel like you have to pee, the nurse may have to adjust your catheter so the urine flows more easily.

If you need help

You will have a button you can press to call us. Don't be afraid to call if you need anything.

Your hospital schedule

This is a general guide of what to expect during your hospital stay. Everyone's healing is different. This schedule, including what medications you get, may change based on your unique medical needs.

Day of surgery — before surgery

- No food or drink.
- Arrive and check in.
- Meet your surgery team, including the anesthesiologist.
- Sign paperwork for surgery.
- IV put in arm.

Day of surgery — after surgery

- Your doctor will talk to friends and family after surgery.
- Spend 2–3 hours in the post-anesthesia care unit.
  - Staff will keep make sure you are safely recovering from anesthesia.
  - You might feel nauseated, elated, groggy, tearful, hungry or thirsty.
- Move from post-anesthesia care to a hospital room:
  - The inpatient unit is where most of our patients recovering from gender-affirming surgeries stay.
  - The staff is trained to provide culturally competent and gender-affirming care. They are very familiar with the recovery process from these procedures.
- What's on my body?
  - Urinary (Foley) catheter — a tube to drain urine.
  - Dressing on the surgical area.
  - Vaginal stent/dressing — keeps the new vaginal skin pressed against the surrounding tissue while it starts to "take," or heal.
  - Drains — tubes that take extra blood and fluid out of your body and collect it in a bag.
  - Sequential compression devices on your legs; cuffs fill with air and squeeze your legs to increase blood flow and prevent blood clots.
  - IV in arm.
- Medications:
  - You will be given antibiotics before surgery and IV pain medication during surgery.
  - If you feel nauseated after surgery, we can give you a medication to help.
  - You may be able to press a button to control how much narcotic pain medication you get through your IV. This is called patient-controlled analgesia (PCA).
  - If you have trouble with bowel movements after surgery, we can give you stool softeners.
- Food and drink:
  - Start with ice chips because your throat might be sore.
  - Drink water slowly. If you drink too much, you might feel sick to your stomach.
  - Move to small bites of food, then regular meals when you feel ready (maybe the next day).
  - Eating yogurt can help build up good bacteria after taking antibiotics.

Day 1 after surgery

- You are on strict bed rest. You can't get out of bed, but it's OK to slowly move around in bed. You can sit up, move side to side or lay on your side — whatever feels comfortable. **The reason for bed rest is to avoid movement inside the vagina, so avoid big, rapid leg movements**.
  - Rolling over in bed is most comfortable if you do a "log roll." The nurse can show you how.
  - The head of the bed should be raised to 45 degrees or less.
- Start bed exercises from physical therapy for 5–10 minutes every hour:
  - Lying on your back, with feet slightly elevated
  - Ankle pumps, quad sets, gluteal squeezes
- If you feel gas and bloating, start abdominal massage exercise from physical therapy for 5–15 minutes, 1–3 times a day.

- Pain medication:
  - You will be given 650 mg of acetaminophen (Tylenol) by mouth every 6 hours.
  - You will be given 15 mg of Toradol (a nonsteroid anti-inflammatory drug similar to ibuprofen) by IV every 8 hours.
  - You can be given 5–15 mg of oxycodone (a narcotic pain medication) by mouth every 4 hours, as needed, for moderate pain.
  - If you are still in pain after taking the oxycodone, or if your pain is sudden and severe, tell your nurse.
- You will be given Miralax (stool softener) to prevent constipation.
- You can have a bed bath if you want.
- ***If you need to have a bowel movement, you will use a bedpan until Day 5.***

Day 2 after surgery

- Bed rest continues.
- There are no changes to your treatment plan between Day 1 and Day 2.
- Do bed exercises from physical therapy every hour you are awake. Do abdominal massage if you want.

Day 3 after surgery

- Pressure dressing (external dressing on vulva) is taken off. You might feel more comfortable after this because you can open your legs a bit and move your hips from side to side a bit more.
- Pain medication:
  - You will be given 650 mg of acetaminophen (Tylenol) by mouth every 6 hours.
  - **If you had robotic vaginoplasty, you will likely be able to slowly get up and out of bed with the help of a nurse. If you had open vaginoplasty, bed rest will continue until day 5 after surgery**
  - You can be given 600 mg of ibuprofen by mouth every 8 hours, as needed, for mild pain.
  - You can be given 5–15 mg of oxycodone by mouth every 4 hours, as needed, for moderate pain.
  - If you are still in pain after taking the oxycodone, of if your pain is sudden and severe, tell your nurse.
- You will be given Miralax to prevent constipation.
- Do bed exercises from physical therapy every hour you are awake. Do abdominal massage if you want.
- You can have a bed bath if you want.
- ***For those on bed rest, if you need to have a bowel movement, you will use a bedpan until you are able to get out of bed.***

Day 4 after surgery

- Do bed exercises from physical therapy every hour you are awake. Do abdominal massage if you want.

Day 5 after surgery

- Internal dressing (stent) taken out.
- Drains may be taken out, depending on how much fluid is still draining.
- Bladder catheter taken out:
  - Removing the catheter is quick. You might not feel anything, or you might feel briefly uncomfortable.
  - Try to pee. Your bladder will be empty and will take a couple of hours to fill. So drink lots of water! Expect the pee to go all over the place — not a steady stream!
  - One in 5 people can't pee at all or can't pee well enough. If this happens, we put the catheter back in so you are safe when you go home. We will take it out at your first follow-up visit in the office.
  - The nurses will give you plenty of time to try to pee. After you go, they will scan your bladder to see how much urine is left. Some people can pee a bit, but too much urine is left. The surgery and anesthesia can affect your nerves and make it hard to empty your bladder. You're not doing anything wrong if you having trouble peeing.
  - Tips to pee:
    - Run the sink or shower water. The sound can help.
    - Put your hands in warm water. This can help you relax.
    - If allowed, use a small container to pour warm water over the skin between your legs.
- ***If you had robotic approach vaginoplasty, you will learn to dilate your new vagina at this time. Dr. Dy or Dorian Scull, our physician assistant, will go over this with you.***
- Stand up and walk, with the nurse's help:
  - Most people feel a little dizzy getting up for the first time. Begin by raising the back of the bed more upright to begin adjusting.
  - Call the nurse when you feel ready to try to walk. The nurse will take the compression cuffs off your legs and help you move.
  - First you will sit on the edge of the bed and dangle your feet. Next you will stand up for a little bit. Then you will try to walk.
- Take a shower, with the nurse's help:
  - Use warm water, not hot, for this first shower. Hot water can cause your blood pressure to drop and make you dizzy.
  - Get your hands soapy and use them to clean all the folds and creases between your legs. Be gentle, but clean yourself as well as you can. It will feel very sensitive. Don't scrub hard and don't use a washcloth.
  - Let the water flow over your vulva to wash away the soap. If you use a hand-held shower, spray the water on your belly and let it flow down between your legs.
  - Gently pat the skin dry with a towel. Don't rub. If you can, let the skin air dry.
  - Sit on a shower chair if you feel dizzy or tired. The nurse can bring one.

Before discharge

- You and your caregiver should read your discharge instructions. Ask questions about anything you don't understand.
- Your caregiver will pick up your prescription medications before you leave the hospital.
- Make an appointment for your first follow-up visit.

Jess Guerriero, a social worker with the Transgender Health Program, is an excellent resource for patients seeking gender-affirming surgery.

Exercises for your hospital stay

From our physical therapy colleagues

During your 5-night hospital stay, much, if not all of your time will be spent laying in the hospital bed. This means you will not be up and walking around. Sometimes this can cause your legs to swell with fluid. These exercises will help reduce the swelling and increase circulation to help you heal.

Do these exercises for 5–10 minutes every hour that you are awake. Your physical therapist will review these with you at your appointment before surgery.

Deep belly breathing: 5–10 reps

- **Movement:** Breathe in deeply, allowing your belly to expand. Exhale slowly, allowing your belly to drop back down.
- **Tip:** Keep your breaths even and gentle. Try breathing in through your nose and out slowly through your lips.

Ankle pumps: 20–30 reps

- **Movement:** Slowly pump your ankles by bending and straightening them.
- **Tip:** If possible, elevate your legs. Try to keep the rest of your legs relaxed while you move your ankles.

Quad sets: 20–30 reps

- **Movement:** Tighten the muscles in your thigh to push your knee into the bed and straighten your leg. Hold, then relax and repeat.

Glute sets: 20–30 reps

- **Movement:** Tighten your buttock muscles, then release and repeat.
- **Tip:** Don't arch your low back during the exercise or hold your breath as you tighten your muscles.

Abdominal massage

From our physical therapy colleagues

Purpose: After surgery, you may have constipation or bloating. Abdominal massage can help relieve constipation by stimulating the large intestine. It can also relieve bloating and gas. Your physical therapist will review this with you at your appointment before surgery. If you had robotic approach vaginoplasty, you won't be able to do this because of the belly incisions where the robotic instruments were inserted.

Directions: Do this for 5–15 minutes, 1 to 3 times a day, while on your back. All steps should be pain free.

- **Step 1:** To relax, gently move your hands across your belly from one hip to the other. Breathe slowly and gently.
- **Step 2:** Provide firm downward pressure on the lower left side of your belly. Hold for a few seconds and repeat.
- **Step 3:** Make small clockwise circles with firm pressure over the large intestine from your lower left side to your lower right side. Continue the circles up, over and down to make a "U" shape.
- **Step 4:** Starting on the lower right side, provide firm, long strokes in I, L and U motions over your belly ("I Love You" strokes).

Discharge instructions

Diet

- No restrictions to your diet.
- You will go home with stool softeners to help with constipation that may come from taking narcotics. Drink plenty of fluids and eat a well-balanced diet.
- Take 1 capful of Miralax dissolved in 8–12 ounces of water daily for 1 month to prevent constipation.
- Avoid bearing down or straining with bowel movements.

Activity

- Limit walking to 2,000 steps a day for the first 4 weeks.
- You can use stairs. Take one step at a time slowly (both feet on the step).
- Do not lift anything greater than 10 pounds for the first 4 weeks.
- Do not drive while on narcotics or with a urinary catheter in place.
- You will get tired easily as your body recovers. Take time to rest and limit activities.
- Please refer to "Getting back to my normal routine" in this guide for more activity restrictions.

Pain control

Take 625 mg of Tylenol (whether in pain or not) every 6 hours until your first follow-up appointment.

- Take 600 mg of ibuprofen every 8 hours for moderate pain that persists after taking Tylenol. Do this until your first follow-up appointment.
- We will give you a limited supply of 5 mg oxycodone tablets. This is a narcotic pain medication. Take 1–2 tablets as often as every 6 hours. This is for severe pain that "breaks through" after taking Tylenol and ibuprofen. Take this only as directed.
- We may also give you a prescription for a medication called gabapentin. This can help with nerve-related pain and can reduce the need for narcotic pain medication. You can take between 100 and 300 mg every 8 hours, as needed, for pain that is not controlled by ibuprofen and acetaminophen. It does not have the risk for dependency, overdose, or constipation that is associated with narcotic pain medicine. But it can cause drowsiness and increase other side effects associated with narcotic pain medication.
- Do not drive while taking narcotics.
- Apply ice packs to the mons (the fatty tissue over the pubic bone) for 20 mins every 1–2 hours. Put a cloth between the ice and your skin.

Please see the "Pain Management" section of this guide for more information.

The Gender Spectrum Collection

Wound care

- **You will have some drainage when you go home.**
- Some small bloody or white drainage is expected. Have sanitary pads on hand. You may need to wear them until your wounds have healed. **Shower twice a day for the first 6 weeks.**
- DO NOT immerse in a tub or pool for 3 months or until your surgeon says it's OK.
- When showering, lather hands with soap and clean your surgery site gently but thoroughly. Do not scrub incisions. After cleaning, pat dry or air dry.
- Hypoallergenic soap or mild soap without fragrances may be less likely to irritate your already sensitive skin.

Estrogen

- Restart oral estrogen if you had switched prior to surgery when you get home.
- You may need to make an appointment with your hormone provider. Your dosage may need to be adjusted.

Catheters or drains

- If you go home with a catheter or additional drains, they will be removed at your first follow-up appointment. We'll tell you how to manage your catheter or drains when you're discharged.
- Refer to the Drainage chart in this guide for more information.

Dilation

- You won't dilate while you are in the hospital unless you had robotic approach vaginoplasty. (If you had robotic approach vaginoplasty, you will start dilating on your last day in the hospital.)
- You will be given a set of dilators and start dilating at your first follow-up visit. This appointment should be scheduled when you leave the hospital.
- We know the importance of dilation early after recovery. We believe there are no negative effects to waiting 2 weeks after surgery to dilate.

Sexual activity

- No vaginal, anal or oral sex for 3 months.
- You can gently massage the area to help desensitize overstimulated nerves. Do only what massaging you can tolerate.
- You can use a vibrator at any point after surgery if you find it pleasurable. As you heal, use a vibrator rather than your hand for stimulation to prevent injury. Avoid rubbing or putting too much pressure on the tissue.

How will the surgery site look?

- You will have a lot of swelling and bruising. It will look puffy. It can take many months for the swelling to go down.
- You will know how the area will look 6–12 months after surgery.
- You will have stitches. They will dissolve and fall out on their own.
- Use ice to help with swelling. Cover the ice pack with a thin towel or shirt. Leave it on the surgical site for 15–20 minutes. Take it off for 15–20 minutes. Repeat.

Drainage chart

- If you go home with one or both drains, track how much comes out.
- The nurses may show you how to secure the bulbs to your pants or other clothing. Know where the bulbs are before pulling your pants/clothes down.
- Measure the output from each drain in the morning and in the evening to get a 24-hour measurement.

If output is less than 30 ml from both drains combined for 2 days or more, we can remove the drains.

Here's an example:

DAY 1			
A.M.	**Left**	**Right**	**Total**
	4	5	9
P.M.	**Left**	**Right**	**Total**
	5	10	15
			24 ml

DAY 2			
A.M.	**Left**	**Right**	**Total**
	5	8	13
P.M.	**Left**	**Right**	**Total**
	1	4	5
			18 ml

In the Day 1 a.m., the combined (left and right) total output was 9 ml. In the p.m., the combined output was 15 ml. The total output in 24 hours was 24 ml. Because total output for 2 days in a row was less than 30 ml, you can assume the drains can be removed in the clinic.

Questions or concerns? Call the Urology Clinic at 503-346-1500. Please be as detailed as you can so our staff can relay the information to our nurses, to our on-call residents or to Dr. Dugi.

Drainage chart

DAY:			
A.M.	Left	Right	Total
P.M.	Left	Right	Total
			ml

DAY:			
A.M.	Left	Right	Total
P.M.	Left	Right	Total
			ml

DAY:			
A.M.	Left	Right	Total
P.M.	Left	Right	Total
			ml

DAY:			
A.M.	Left	Right	Total
P.M.	Left	Right	Total
			ml

DAY:			
A.M.	Left	Right	Total
P.M.	Left	Right	Total
			ml

DAY:			
A.M.	Left	Right	Total
P.M.	Left	Right	Total
			ml

Section 4:
After surgery

The Gender Spectrum Collection

Caregiver(s) role and FAQ

What tasks will my caregiver(s) need to help me with and for how long?

Everyone responds to the trauma of surgery differently. Some people bounce back quickly and need little help. Others are slower to heal and need more help. It's impossible to know how you will respond, so your caregiver(s) should be ready to help with these tasks:

Drive you home from the hospital:

- Carry your bags.
- Get you situated at home: Help you into a comfortable position. Make sure water, food, phone and supplies are within reach.

Be available for 24-hour support (for about 2 weeks):

- Most patients do not need around-the-clock care after leaving the hospital. But some do, so a caregiver should be prepared for that for about 2 weeks.
- Most patients need someone present for several hours a day for the first 2 weeks.
- Your caregiver(s) should be available in person or by phone and close by.

Be available for emergencies (for about 2 weeks):

- Be available 24/7 for about 2 weeks to take you to the hospital or urgent care.
- Be mentally prepared and available to call doctors or emergency medical personnel.
- Be available to provide extra support or wound care.

Help with cleaning, dressing, looking at the surgical site (for about 4 days):

- Many patients can care for their wounds. But sometimes it's hard to see or reach the site. It may be too painful or mentally difficult at first. A caregiver should be available to help for the first 4 days or so.

- Someone on your support team needs to be comfortable with blood, genitals, pee and poop. It should be someone you are comfortable with helping you with genital care and going to the bathroom.

Run errands (for about 3 weeks):

- Pick up medications
- Go grocery shopping
- Walk your dog
- Other errands that require driving or a lot of walking

Help around the house (for about 3 weeks):

- Tidying up
- Child care
- Laundry
- Lifting anything over 10 pounds

Drive you to appointments (for about 3 weeks):

- Remember not to drive while taking narcotic pain medication.
- Your driving skills and reaction time are likely to be compromised by the physical trauma and discomfort of your surgery.

Keep you company:

- Recovering from surgery can be lonely.
- It's nice to have someone to talk to, listen to or watch movies with.

What if I don't have a caregiver(s) or anyone I can ask?

- Try reaching out to online support groups and communities for help.
- If you don't have any luck, contact the Transgender Health Program.

Where can my caregiver(s) get support?

- For questions related to wound care or complications from surgery, call the Urology Clinic at 503-346-1500.
- For mental and emotional support (caregiving can be draining), Brave Space LLC has parent and caregiver community group meetings. Contact Brave Space at 503-486-8936 or Info@BraveSpaceLLC.

What events and appointments can my caregiver(s) attend?

Only you can decide how comfortable you are with your caregiver coming to appointments. You'll get the most out of these appointments if you feel comfortable, relaxed and safe. That should guide whether you would like your caregiver(s) present.

Here are appointments caregivers can attend, and what to expect, to help you decide how involved you want your caregiver(s) to be.

- **Surgery information class** (see the schedule in your booklet pocket):
  - We go over surgery details, including preparation and recovery.
  - We recommend you bring your main support person. If you need to bring more than one person, tell us when you sign up.
- **Pre- and post-op appointments:** We'll do a genital and wound exam at every appointment except for the one right before surgery.
- **Pelvic floor physical therapy:** Depending on your comfort level, we'll need you unclothed from the waist down.
- **Can my caregiver(s) stay overnight in the hospital with me?**
  - Yes. An extra bed can be set up.
  - Space may be limited and you may be limited to only one overnight guest.

Urination and bowel movement strategies

From our physical therapy colleagues

Urination after surgery

You will have a catheter to drain your bladder while you're in the hospital. The catheter is typically removed about Day 5. Some patients find it difficult to urinate at first. Here are a few tips to help. If you can't urinate, you may need to go home with a catheter.

- Go on a short walk. Being upright can stimulate the bladder.
- Sit on the toilet with your feet flat on the floor. Take deep breaths. Do not strain, hold your breath or push.
- Try running the sink or shower. Hearing water may help the bladder start.
- Put your hands in a basin of warm water. This can help relax the pelvic floor to allow the bladder to begin.
- Ask the nurse for a peri bottle and fill it with warm water. Gently pour the water over your vulva and let the water drip into the toilet.
- Take a shower and try to void there.

Bowel movements after surgery

Having regular bowel movements after surgery is very important. Becoming constipated can lead to increased pain and bleeding, can cause difficulty urinating and can make dilation difficult.

If you need to have a bowel movement, while on bed-rest in the hospital, the nurse will help you use a bedpan.

Surgery, stress, medications and inactivity can all contribute to constipation. You will be given stool softeners to help you have regular, non-strained bowel movements after surgery. Eating a diet rich in plant-based fibers, such as fresh fruits and vegetables and staying well-hydrated will help to keep you regular.

Medication management suggestions for bowel regularity after surgery:

- Take 1 capful of MiraLAX (polyethylene glycol), dissolved in 8-12 oz of water 1-2 times per day.
- Add on 8.6 mg tablet of Senna (sennosides) daily if not able to produce daily to every other day bowel movements with twice daily MiraLAX.
- If no bowel movement after 4 days, please notify your surgical team for further recommendations.
- MiraLAX and Senna are sold over the counter, but we will also write you a prescription before you leave the hospital.

If bowel movements are difficult, try these additional tips:

- If you feel constipated or bloated, refer to the abdominal massage information in this guide.
- Put your feet on a stool or box to raise your knees above your hips. Lean forward and rest your elbows on your knees. This improves the angle of the rectum to allow stool to pass more easily.
- Take a few slow, deep breaths to relax.
- If you need to push, avoid straining and holding your breath. Instead, exhale gently as you tighten your stomach muscles.
- Sometimes it can help to support your vulva and vagina with your hand if you need to bear down to have a bowel movement.

It is important manage any constipation before surgery and make sure that you are having regular bowel movements in the weeks leading up to surgery. If you are struggling with constipation, please let us know at your pre-op visit. If constipation has been a lifelong struggle, please let us know at your consult. We can likely offer suggestion to help improve your bowel regularity.

Pain management

Previous surgeries can offer insight to your pain threshold. You should expect some degree of pain and discomfort for several weeks after surgery. It will be worse right after surgery and for several days afterward as you become more active.

Your pain should be manageable so you can still sleep and do basic household activities. We know relying heavily on narcotic pain medication can be dangerous:

- You can become physically and/or mentally dependent on the medication.
- It can cause constipation and/or intestinal blockage.
- It can make your pain more difficult to manage long term.
- It puts you at risk for accidental overdose, which can lead to death.
- It is not safe to drive or operate heavy machinery while taking narcotic pain medication.

We've put a lot of thought into your pain management, offering ways to help you minimize how much narcotic pain medication you need.

- We recommend that you take acetaminophen (Tylenol) on a regular schedule and supplement it with ibuprofen (Motrin, Advil), ice packs and lidocaine patches.
- If you still have pain, we recommend taking the narcotic pain medication oxycodone to help with "breakthrough pain" — pain so severe that it breaks through after other treatments have been tried.

Acetaminophen (Tylenol):

- Take 650 mg (2 regular-strength 325 mg pills) every 6 hours if you're not in pain.
  - Do this until your first follow-up appointment.
  - Don't take acetaminophen if you have liver disease, reduced liver function or an allergy to the active ingredients.
- **Do not take more than 4,000 mg in a 24-hour period.** Know that acetaminophen is a common ingredient in narcotic pain medications such as Vicodin and Percocet. It's also in over-the-counter medications, so be sure to read the labels.

Ibuprofen (Motrin, Advil):

- Take 600 mg (3 regular-strength 200 mg pills) every 8 hours as needed for mild pain.
  - If you still feel pain after taking acetaminophen, supplement with ibuprofen. Take 600 mg (3 regular-strength 200 mg pills) every 8 hours as needed for mild pain. Do this until your first follow-up appointment.
- Don't take ibuprofen if you have kidney disease, reduced kidney function, only one kidney, a history of stomach ulcers or bleeding in your stomach or intestines, or an allergy to the active ingredient.

Oxycodone (narcotic pain medication):

- We will give you a limited prescription of 5 mg oxycodone pills. Take these only as directed and only as needed for severe pain.
- You can take 1 pill every 6 hours, but we urge you to limit this to when you need it most. Many patients find they can tolerate some pain while awake and need oxycodone only to rest or sleep.
- There is a risk of accidental overdose, dependency, nausea, drowsiness, sleepiness and constipation. Do not drive or operate heavy machinery while taking this medication.
- If it looks like you will run out before your next clinic visit, call the Urology Clinic at 503-346-1500 during business hours. Give us 24–48 hours to prepare the prescription. You will probably need someone to pick up the prescription, so plan ahead.

Gabapentin (for nerve related pain)

We may give you a prescription for gabapentin, which is a medication used to treat nerve-related pain. This does not have the overdose or addiction risk of narcotic pain medications and does not tend to cause constipation. It can reduce the amount of narcotic pain medication needed after surgery.

- You can take between 100 and 300 mg every 8-hours, as-needed, for pain not controlled by Ibuprofen and Acetaminophen.
- Drowsiness and dizziness are the most common side effects.
- Do not exceed 3,600 mg in a 24-hour period.

Ice packs:

- Apply ice packs to the surgery site for 20 minutes every 1–2 hours, as needed. This can reduce pain and swelling. Put a cloth or towel between the ice pack and your skin.

Lidocaine patches:

- Lidocaine patches can help with pain on the surface of the skin. You can buy them over the counter, but we can write you a prescription, if you like. Many insurance companies don't cover the cost, so you may want to look into this.
- Each lidocaine patch can be cut in half and applied 1–2 inches from each side of the labia majora.
- You should use 1 patch a day until your first follow-up visit. Apply it for 12 hours, then remove it for 12 hours before applying a new one.
- If you have discomfort or burning, remove the patch and stop using them.

Tracking your pain

Keep track of how you're managing your pain with this tracking table. Please fill in the times you take each medication so you don't accidentally double or miss a dose. **Find more copies in your booklet pocket.**

Pain management tracking table

Name of Medication	Dose	Frequency	Notes	Schedule *Write down the time you took the medication*			
				A.M.	Midday	P.M.	Bedtime
Acetaminophen (Tylenol)	625 mg	Every 6 hours	Take on a schedule whether in pain or not. Do not exceed 4,000 mg in a 24-hour period.				
Ibuprofen (Motrin)	600 mg	Every 8 hours	Take only as needed for moderate pain.				
Oxycodone	1 tablet (5 mg)	Every 6 hours	Take only as needed for severe pain.				
Ice	N/A	20 mins every 1–2 hours	Put ice pack on cloth over the mons (not touching skin).				
Polyethylene glycol (Miralax)	1 capful in 8–12 oz liquid	Every day	Take daily to prevent constipation for 1 month.				
Gabapentin	100–300 mg	Every 8 hours	Take only as needed for moderate to severe pain				

Is this normal or should I be worried?

Frequently asked questions after surgery

Signs of a possible surgical site infection

If you have any of the following:

- An increase in swelling, redness and pain
- A fever of over 101 degrees F
- Chills

Call the Urology Clinic:

- 503-346-1500 business hours
- 503-494-9000 evenings and weekends

If you also feel dizzy or lightheaded, go to the emergency room. Don't drive yourself.

Bleeding/discharge

I have a constant, gushing stream of bright red blood. I am soaking through 2 large pads every hour. What should I do?

- Apply firm, direct pressure with a clean rag or gauze for 10 minutes.
- If the bleeding has stopped and you don't feel dizzy or lightheaded, you should be fine. Rest and limit activity to keep the site from bleeding again.
- If the bleeding slows but doesn't stop, apply firm, direct pressure for another 10 minutes to see if it stops.
- Douche in the shower (or rinse with water) to release blood clots, then repeat firm, direct pressure where there is bleeding.
- If you still can't get the bleeding to stop, call the Urology Clinic at 503-346-1500 during business hours or call our evening/weekend number, 503-494-9000.
- ***If you also feel dizzy or lightheaded, go to the emergency room. Don't drive yourself.***

I am still bleeding regularly and having to wear pads, but the bleeding isn't super heavy. Is this normal?

- It's normal to have bleeding, oozing and discharge from the surgical site for up to 1 month, possibly longer.
- Increasing pain or redness with or without fever or chills is not normal. It could be a sign of an infection. Call the Urology Clinic or our evening/weekend number.
- ***If you also feel dizzy or lightheaded, go to the emergency room. Don't drive yourself.***

I am bleeding when I dilate. Is this normal?

Yes. It could be a sign of granulation tissue in or around the vaginal canal. This is new tissue and blood vessels that form during healing. We can treat this in the clinic with silver nitrate.

I have noticed an increase in discharge since I started dilating. Why?

As the water-based lubricant warms to your body temperature, it turns to liquid and comes out as discharge. The lubrication often takes dried blood and dead skin cells with it. For this reason, the color of your discharge could be anything from slightly cloudy or off-white to red or brown, depending on your skin color. This is normal and is part of cleaning the vagina.

I see an open red wound in the surgical site. It's not bleeding much, and it's not very painful. Should I be concerned?

This is most likely an area of wound separation or granulation tissue, which is not an immediate concern. Apply gauze after each shower and change the gauze after each trip to the bathroom. Use a small amount of gauze, but have it touching the area of concern. Bring this up at your follow-up visit.

Swelling

I am more swollen than I think I should be. How much swelling is normal and for how long?

It's normal to have significant swelling. The appearance of the vagina can be quite shocking at first.

- By 3 months, the swelling should calm down. It may come and go with activity.
- By 6 months, you should have no routine swelling and less swelling with activity. You'll begin to see what your vagina's final appearance will be. It also may continue to change with time.
- By 1 year, swelling should be resolved. You will know what your vagina will look like long term.

I developed sudden swelling and pain. What should I do?

That could be a hematoma or an infection. Call the Urology Clinic or our evening/weekend number. ***If you also feel dizzy or lightheaded, go directly to the emergency room. Don't drive yourself.***

Urology Clinic:

- **503-346-1500** business hours
- **503-494-9000** evenings and weekends

Pain

How long should I have pain and how can I manage it?

Everyone responds to surgery and pain differently. Some patients recover quickly and report minimal pain. Others take more time and have much more bothersome pain levels.

- The worst of the pain should be over within 2 weeks. You will still have significant discomfort, but things should be calming down.
- You may notice that the more active you are, the worse your pain and swelling. This is your body telling you to slow down.

My pain is getting worse, and I'm almost out of the narcotic pain medication. What should I do?

Try these things first:

- Supplement narcotics with Tylenol, ibuprofen and lidocaine patches as suggested in the "Pain Management" section of this guide.
- Apply ice for 20 minutes each hour.
- Limit activities that increase pain and swelling.

If these don't control your pain, call the Urology Clinic:

- **503-346-1500** business hours
- **503-494-9000** evenings and weekends

Odor

I have noticed my vagina is starting to smell bad. It doesn't hurt, and I feel fine otherwise. Is this normal?

A foul odor from the vagina could indicate an area of tissue necrosis. Small areas of tissue necrosis — dead cells — are not uncommon. Bring this up at your follow-up visit. We'll have you treat it with regular dressing changes.

It could also be the sign of poor wound hygiene. Gently wash the surgical site, labia folds and between your legs with mild soap and water twice daily. Don't use a washcloth or scrub for the first 6 weeks.

Signs of a possible urinary tract infection

If you have any of the following:

- An increase in swelling, redness and pain
- A fever of over 101 degrees F
- Chills

Call the Urology Clinic:

- **503-346-1500** business hours
- **503-494-9000** evenings and weekends

If you also feel dizzy or lightheaded, go to the emergency room. Don't drive yourself.

Urinating/catheter

There is a little blood and/or sediment coming out of my catheter. Is this normal?

Yes. Your bladder is irritated because there is a catheter in it. Call us if you have any concerns.

Other possible problems with a catheter:

- The catheter is not draining (no urine is coming out of your body).
- The catheter starts leaking.
- Urine is thick and cloudy, or it has blood or sediment in it.
- There is no urine in 6–8 hours.
- You have pain or burning in your urethra, bladder or belly.
- A steady stream of blood comes out the catheter.

If you notice any of these problems, call the Urology Clinic:

- **503-346-1500** business hours
- **503-494-9000** evenings and weekends

I am spraying all over when I pee. Is this normal? Will it get better?

This is common after bottom surgery. It will often resolve on its own after the swelling goes down. Sometimes it persists because of asymmetry or excess tissue. If it lasts 6 months, bring it up in your follow-up visit. We may be able to improve this with a small revision surgery.

I haven't been able to pee for more than 8 hours. I feel like I have to pee but can't, and it's starting to hurt. What should I do?

Go to the emergency room. If you can't empty your bladder on your own, it will have to be drained with a catheter. That will keep urine from backing up and causing damage to your bladder or kidneys.

We will do some tests to figure out why you're having trouble peeing so we can treat it.

What to expect at follow-up visits

It's important that you show up to all your follow-up visits. These let us assess your healing and teach you about dilation and wound care. We know it can be time consuming, especially if you're coming from far away. But it's an expectation for our patients to ensure the best possible outcome.

First follow-up visit
2 weeks after surgery

- This is a 30-minute visit. We'll give you a set of dilators. We'll show you how to use the smallest one. Bring your dilators to all your future follow-up visits, including physical therapy visits.
- If there are any wound concerns, they will probably come up between your first and second visits. We will go over any issues.
- If you had robotic approach vaginoplasty, you will begin dilating on your last day in the hospital. Your first follow-up visit is a good time to ask any questions about dilation.

Physical therapy visit
3 weeks after surgery

- Ask your pelvic floor physical therapist about any dilation issues, including relaxation techniques during dilation. Physical therapists are an invaluable resource during your recovery. Bring your dilators.
- Ask for a second visit if you have more concerns.

Second follow-up visit
4 weeks after surgery

- This is a 15-minute visit.
- We'll make sure you're healing well and answer any questions.

Second physical therapy visit
5 weeks after surgery

- This is a good time to address any additional concerns about dilation.

Third follow-up visit
6 weeks after surgery

- This is a 15-minute visit.
- We'll want to see how you're doing, how your pain has been and where you are in your dilation.

Fourth follow-up visit
3–6 months after your last visit

- This is a 15-minute visit.
- We'll assess your progress, see how you are healing and answer any questions.

One-year follow-up visit

- This is a 15-minute visit to see how you're doing.

Dilation

Getting started with dilators

Your physical therapist will review this information with you at your 3-week follow-up visit. The therapist will also provide strategies to help with any difficulties and provide a dilation position handout.

Why should I dilate?

Your body naturally wants to close your vagina after surgery, just like it naturally wants to close your skin when you have a scrape or cut. Dilating will gently stretch the vagina and keep the depth created by surgery.

When should I start dilating?

Start dilating at your first follow-up visit, about 2 weeks after surgery (or on Day 5 for robotic approach vaginoplasty). We will give you 4 dilators and teach you how to use the smallest one on your first follow-up visit. At this visit, please:

- Take pain medication before your visit. Do not drive if you take narcotics.
- Bring your donut pillow to sit on.

What does dilation feel like?

It will be uncomfortable because you are stretching your vagina. It should not hurt. We often hear that it is “not bad” or “weird more than painful.”

How deep do I insert my dilator?

The dilators help keep the vaginal depth and increase the width. We’ll tell you the target depth at your first follow-up visit. Do not push through pain or resistance to gain depth. Dilation cannot create depth. You will insert the dilator to see ___ dots. Be sure you reach this depth each time you dilate.

How often do I dilate?

Dilate 3 times a day for 30 minutes each time for the first 12 weeks after surgery (or until your doctor says that you can change to twice a day). Spacing dilation 8 hours apart is best. You might need to vary that. The more time between dilation, the more time you’ll need to get to your vaginal depth.

How do I lubricate?

Use water-based, medical-grade lubricant. Any brand is OK. After 3 months, you can use a thinner water-based lubricant such as Astroglide.

What if I miss a dilation session?

Try to dilate 3 times a day as often as you can. When you can’t, dilate twice a day for 45 minutes each time.

What positions do I use?

Find a position that will let your legs, hips and pelvic floor relax. Good options are:

- Lying on your back, with your feet flat and knees bent, pointing to the ceiling. Use pillows under your shoulders and head.
- Lying on your side, with pillows under your head. Bend your knees, with the bottom leg resting on the floor and the top knee pointing to the ceiling or resting on a wall or back of a sofa.
- Don’t do a butterfly pose with your knees out wide. This can strain the tissue.
- Don’t slump while sitting. This can make it difficult for the pelvic bones to move.

What if I can't locate my vagina to place the dilator?

Get a hand-held mirror and adequate lighting to better visualize the area. Then, locate where the lower labial stitches join at mid-line. Using a clean finger, gently explore this area to find where there is a space that can easily accommodate your finger. It can be helpful to start a bit lower than expected and gently slide your finger upwards. If you are still not able to locate the vagina, call the urology clinic during business hours.

How do I insert the dilator?

Using a hand mirror, find the vaginal opening below the urethra. Cover the dilator with plenty of water-based lubricant. Slowly insert it at a 45-degree angle with the dots facing you. As the dilator continues to insert, the angle will flatten and the dots will point to the ceiling.

Take slow, deep breaths. If you feel pain or significant tightness, pause and take deep breaths to let the tissues stretch and relax. After a minute or two, try to gently insert the dilator more until you reach your target depth. Avoid lifting your head or straining; this will make dilating more difficult.

When can I move to the next size dilator?

You can switch when it's easy to use the current one to your full depth a couple of times in a row. See "Changing your dilator size and schedule" below for more guidance.

How do I track my progress?

Use the "Dilation tracking table" handout. Each time you dilate, rate it as easy, medium or difficult.

- **Easy:** Inserts to target depth in less than 1 minute. Only a little resistance or discomfort.
- **Medium:** Inserts to target depth within 5 minutes. Some resistance.
- **Difficult:** Takes longer than 5 minutes to reach your target depth. Pain during or after.

An example of how to fill out your dilation tracking table:

Time:	9 a.m.
Dilator(s):	Orange
Duration:	30 minutes
Depth:	See 2 dots
Difficulty:	Medium

How do I clean my dilators?

Wash them with gentle soap and water. Dry them off and put them back in the pouch.

Is there any situation when I should stop dilating?

There are very few circumstances that would cause you to stop dilation. If you are concerned and think you should stop dilation, please contact the urology clinic and continue to dilate (even if using a smaller dilator) until you hear back from us.

How do I clean my body?

- Before dilating, put a towel, paper towels or a disposable absorbent pad under you to make cleanup easier. Puppy pads can be a cheap option.
- Pee after dilating. Wipe front to back. This helps stop bladder and urinary tract infections.
- Shower after dilating if you want to. Gently pat the area dry.

What kind of vaginal discharge will I see?

After you start dilating, you will see more discharge. When you put the lube in your vagina, it will turn to liquid and come out as discharge. The lube helps clean the skin inside your vagina. Some people may have bleeding after dilating. This is OK if the bleeding is slow or stops on its own. If you bleed through 2 pads in an hour, call the Urology Clinic and seek urgent care:

- **503-346-1500** business hours
- **503-494-9000** evenings and weekends

Changing your dilator size and schedule

Can I make my vagina deeper with the dilator?

No. You can make your vagina wider by using larger dilators.

What is my "goal size"?

It's the size dilator you want to keep using for the rest of your life. Many people choose the blue or green dilator as their goal size. There is even an extra-large orange dilator available for those who need it. Other people are happy with a smaller goal size. It's your decision. If you think you might want a larger goal size in the future, consider trying to get to that goal within the first year, while the tissues are easier to stretch. It will be harder to change to a new goal size after years have gone by and your vagina has fully healed.

When do I move up to the next size dilator?

When it feels easy to insert your dilator to your target depth (see ____ dots) for 3 sessions in a row.

How do I move up to a bigger dilator?

First time:

- Use the smaller dilator for 20 minutes.
- Then use the next size up dilator for 10 minutes.
  - Put lube on the dilator. Slowly insert it as deep as you comfortably can. It's OK if it can't go as deep as the smaller dilator.
  - DO NOT push past resistance. There might be some discomfort or stretch. Don't push into pain.
- Your total time dilating is 30 minutes.

If it went well, then next time:

- Use the smaller dilator for 15 minutes.
- Use the next size up dilator for 15 minutes.
- Try to go a little deeper with the second dilator than you did the first time, if it's comfortable. Your goal is to gradually reach the same dot as you can with the smaller dilator.
- Your total time dilating is 30 minutes.

Slowly increase the time and depth with the larger dilator. Continue using the smaller dilator so you can keep the vagina's depth. After you can get to your target depth with the larger dilator, you can stop using the smaller dilator. When it's easy to get the larger dilator to the full depth, use the next size up dilator, then largest if you want. Use the same steps.

Do I have to stop using the smaller dilators?

No. You can keep using them to "warm up" for a few minutes. Some people use the smaller dilator to start their dilation sessions for their whole life. It's your decision.

When do I use dilators less often?

Change to dilating twice a day:

- 12 weeks (or more) after surgery
- When you can insert your goal size dilator to the full depth
- AND your doctor says yes

Dilate twice a day for 30 minutes each time.
Keep track of:

- How deep you can dilate
- How long it takes to reach full depth
- Symptoms: resistance, discomfort, soreness after dilating

If your symptoms stay the same, keep dilating twice a day. If it gets harder to insert the dilators, go back to dilating 3 times a day. After a couple weeks, try again to change to dilating twice a day. Continue like this to gradually decrease the frequency over time.

How do I set a long-term dilation schedule?

Here is a general guide to help gradually decrease your dilator frequency. Everyone is different, so go at your own pace. If you need to dilate more often, that's fine!

5–6 months after surgery	Dilate once a day 30 minutes each time
6–12 months after surgery	Dilate 5 times a week, then 3 times a week, then twice a week, etc. 30 minutes each time
1 year after surgery, and for the rest of your life	Dilate once a week 30 minutes each time

Can I move the dilator around inside my vagina?

Yes. You can:

- Move the dilator in and out gently.
- Squeeze your muscles around the dilator.
- Gently press the dilator straight down (toward your anus) and hold for 30 seconds to stretch the muscles more.
- Spin the dilator slightly inside your vagina; don't spin it more than 30 degrees in each direction because of the bend at the end.

Can I substitute sexual activity for dilation?

Some people can use vaginal penetration with a toy or penis to keep the depth and width of their vagina without needing dilators. Even with regular sexual activity, keep checking that you can use your goal size dilator comfortably for 30 minutes. After 1 year, we typically recommend using a dilator once a week.

What if I have questions or concerns?

If you have questions, concerns or any of these symptoms:

- Fever
- Chills
- Very upset stomach (severe nausea)
- Pain that doesn't go away with your usual medication
- Drainage or bleeding from the incision
- Sudden numbness, weakness or difficulty talking

Call one of the following:

- **503-346-1500,** Urology Clinic business hours
- **503-494-9000,** evenings and weekends (urology resident on call)
- **503-494-3151,** Physical Therapy

Douching

Douching is the process of washing the inside of the vagina. There are many over-the-counter douche products, which we do not endorse. If you douche, we recommend using saline for the first 12 weeks. You can use plain tap water after this.

For robotic vaginoplasty:

Douching daily with saline is required for the first 12 weeks. We will provide you with supplies when you leave the hospital and enough saline to last for 1 week. After that, you can purchase additional saline or make your own (see instructions below). After 12 weeks, many folks will douche as needed with tap water. It is a good idea to douche about twice weekly long term to wash out any dead skin cells.

For open vaginoplasty:

Douching is optional. Each time you dilate, you get water-based lubrication in the vagina. As this warms to body temperature, it becomes thinner and drains out. As it drains, it carries dead skin cells and debris from the vaginal canal. This can make the discharge after dilating range from off-white to pink or blood tinged.

Homemade douche solution:

Mix ½ teaspoon of table salt for every 8 ounces (1 cup) of water.

We believe that in addition to bathing twice a day, dilating with water-based gel lubrication is often enough to clean the inside of the vagina. Douching can be a good addition to this but is not required for open vaginoplasty.

If you decide you want to douche, we ask that you DO:

- Wait until 4 weeks after surgery.
- Use a homemade saline solution for the first 12 weeks.
- After 3 months, you can switch to tap water.

We can provide gentle douching supplies in the clinic; But we also recommend using a douche bag that you can fill and hang from your shower head. This allows gravity to gently deliver the solution to your vagina. This is much gentler to the healing tissues.

We recommend that you:

- DO NOT use over-the-counter douche solution for the first 3 months after surgery. The scent and chemicals may cause inflammation.
- DO NOT use a squeezable douche bottle for the first 3 months after surgery. It may cause suction that damages the delicate healing tissue inside your vagina.

The Gender Spectrum Collection

Getting back to your normal routine

When will feeling come back?

It can take 6–9 months for the nerves to heal after surgery. Nerves don't regrow for the first 3–4 weeks. Then they grow at 1 millimeter a day (about 1 inch a month). The speed and amount of nerve regrowth is different for everyone. Younger people usually get more nerve regrowth.

You might feel numb in some areas of the surgical site. Nerves regrowing or "waking up" can feel like pins and needles, tingling or a quick electric shock. It might take a while to get feeling in your clitoris — or it might be annoyingly oversensitive.

What if touching my vagina or clitoris is too sensitive or painful?

This could be a sign that your nerves are healing, inflamed or oversensitive. Sometimes gently touching or massaging the vulva (area outside the vagina) can send a signal to your brain that touch is "safe" and "not harmful." This can help if it is too sensitive. A good time to do it is during dilation.

When do I resume my normal activity?

- **Walking:** We ask that you limit your walking to 2,000 steps a day for the first 4 weeks. This is about 1 mile or 20 minutes of walking for the whole day. After 4 weeks, you can begin to gradually increase the number of steps. You may notice that the more active you are, the more swelling, pain and fatigue you have. This is your body telling you to slow down. Listen to your body and don't overdo things.
- **Showering and bathing:** We ask that you shower twice a day for the first 6 weeks. Then you can resume your normal shower schedule. No baths, hot tubs or swimming for the first 3 months.
- **Lifting:** Don't lift anything over 10 pounds for the first 4 weeks. Then you can slowly increase the amount of weight you lift.
- **Workouts:** No working out, running or strenuous yardwork for 6 weeks after surgery. Then you can slowly reintroduce these activities to your routine. No bicycling for 3 months.

What about sexual activity?

- If you can orgasm before surgery, you can probably orgasm after surgery. Most people say it takes longer to orgasm after surgery and "feels different."
- Consider using a vibrator instead of your fingers to explore early after surgery. A vibrator is gentler on the healing skin. You can start using a vibrator as soon as you can tolerate it or find it pleasurable. Many patients find that stimulating the mons (the area of fat on the pubic bone) to be pleasurable soon after surgery.
- You'll need to use lubrication for vaginal penetration. This is common for many ciswomen too. It will reduce the risk of the vagina protruding out of the vaginal canal.
- We recommend a water-based jelly lubricant such as Surgilube or KY Jelly while dilating for the first 3 months. After that, it's OK to switch to a more slippery water-based lubricant such as Astroglide for dilating and intercourse.

When can I start having sex again?

- **Wait 3 months before having oral sex, vaginal sex or anal sex.** This will protect you from infection and let your body heal.
- The first time you have receptive intercourse with your vagina, make sure you're with someone you trust and feel safe with.
- Start sex slowly and gently and see how your body reacts. You may need to stop for a moment to relax your pelvic floor muscles. You may need more lubrication. You may need to stop altogether. Listen to your body.
- If you are having receptive intercourse with a penis, your partner will need to use some form of barrier protection to prevent sexually transmitted infections. This is because your original genital skin is still present. There's no way to know if there are cuts or skin breakdown inside the vagina that might provide access for certain infections.

Long-term care of your vagina

Do I need regular pelvic exams?

- Getting regular vaginal exams is your choice. You don't need to. Some people like to have regular pelvic exams to make sure everything looks OK and there's no infection. A gynecologist or your primary care doctor can give these exams.
- You do not need a pap test.
- If you have a sudden change in your vagina, such as discharge, bleeding, odor or sensation, let us know. We may need to look inside with a tool called a speculum or run some tests to come up with a treatment plan.

Will I have to dilate my vagina for the rest of my life?

Yes. After a year, most people dilate once a week for 30 minutes.

How do I get to the point where I'm dilating only once per week?

After 6 months, if you are comfortable dilating to full depth with your goal-size dilator twice a day for 45 minutes each time, you can slowly begin to decrease how often you dilate. See the "Dilation" section for more information.

If I use my vagina for sex regularly, do I still need to dilate weekly?

You may lose depth or width without knowing it if you don't "check in" with your goal-size dilator. We recommend checking your depth and width once a week while having regular receptive intercourse. If you can use your goal-size dilator with ease and to full depth, you may not need to dilate for the full 30 minutes every week.

Scar massage

From our physical therapy colleagues

Massage can help loosen scar tissue, soften your scars and make them more comfortable and less visible over time. Your physical therapist will teach you how to massage your surgical scar. Begin at 5–8 weeks after surgery, once the wound is closed. Do this daily for 5–10 minutes.

Scar massage should not be painful. If the scar is painful to touch, begin with desensitizing strategies:

- **Desensitization:** Use a tissue, light cloth, dry or wet towel, or your fingertips to gently rub or tap on the scar in all directions. Use light pressure so it's not painful. Gradually use firmer pressure. This will decrease the sensitivity of the scar, and you will become more comfortable touching it.

When the scar is no longer sensitive, use these techniques:

- **Push and pull:** Put two fingers on the scar and move them slowly straight up until the skin stops moving. Hold firm pressure for 20–30 seconds. You might feel a strong pulling sensation, but don't make it hurt. Repeat in the downward direction and to the left and right. Continue with these four motions along the scar's length. You may notice a direction or spot that feels especially "stuck." Spend more time holding in these directions.
- **Skin rolling:** Gently pinch the skin on either side of the scar and lift. Start at either end and move forward and backward, rolling and raising the skin as you move. A stuck scar dimples inward; a free scar will lift easily.
- **Plucking:** Put your index finger on one side of the scar and your thumb on the other. Try to pick up the scar, separating it from the underlying tissue. If you can pick up the scar, move your fingers up and down and side to side. Continue along the length of the scar.

Section 5: Resources

Resources (crisis and support lines)

Transition can be liberating. It can also be scary, feel unsafe, create more dysphoria, disrupt personal relationships and be an emotional roller coaster. Several organizations offer immediate help if you are in a crisis, just need to talk to someone or have questions. Their confidential services are available 24/7.

Trans Lifeline: Offers emotional and financial support to transgender people. Has a peer support hotline for trans and questioning callers. The hotline is staffed by transgender volunteers.

- 877-565-8860
- translifeline.org/hotline

The Trevor Project: Offers crisis intervention and suicide prevention for LGBTQ people younger than 25.

- 866-488-7386
- thetrevorproject.org
- Online instant messaging: TrevorChat
- Text-based support: TrevorText

National Suicide Prevention Lifeline: This national network of local crisis centers has a hotline to provide emotional support to anyone in suicidal crisis or emotional distress.

- 800-273-8255
- suicidepreventionlifeline.org

Support and information groups

In Oregon

- **Basic Rights Oregon:** Statewide LGBTQ advocacy and social justice organization, basicrights.org
- **Brave Space LLC:** Creates community and connects transgender and genderqueer children, teens, adults and allies with expert providers, bravespacellc.com
- **Central Oregon Coast Trans Community:** Newport-area support group for transgender people and their families, on Facebook
- **Human Dignity Coalition:** Bend-based group seeks equality for the LGBTQ community and allies, humandignityco.wordpress.com
- **Northwest Gender Alliance:** Nonprofit social, support and educational group, nwgenderalliance.org
- **Outside In:** Offers resources for name and gender change on identity documents, outsidein.org
- **Portland Q Center:** Provides a safe space to support and celebrate LGBTQ diversity, visibility and community building, pdxqcenter.org
- **Rainbow Youth:** Salem-area organization offers welcoming spaces where LGBTQ and gender-diverse young people and their friends can connect, rainbowyouth.org
- **Sexual and Gender Minority Youth Resource Center:** New Avenues for Youth's safe, supervised space with activities for sexual and gender minorities ages 13–23, newavenues.org/smyrc
- **SO Health-E:** Southern Oregon group dedicated to improving access to health care across lines of race, gender, sexual orientation, disability and income, sohealthe.org. Includes the LGBTQ+ Equity workgroup, which seeks to remove barriers to health care in Jackson and Josephine counties for people in the lesbian/gay/bisexual and gender-diverse communities.
- **TransActive Gender Project:** Provides support groups, information, advocacy and other services to families of Portland-area transgender and gender-diverse youths ages 4–18.
- **Trans*Ponder:** Eugene nonprofit offers support, education, advocacy and other services for transgender and gender-diverse people, transponder.community

National and international

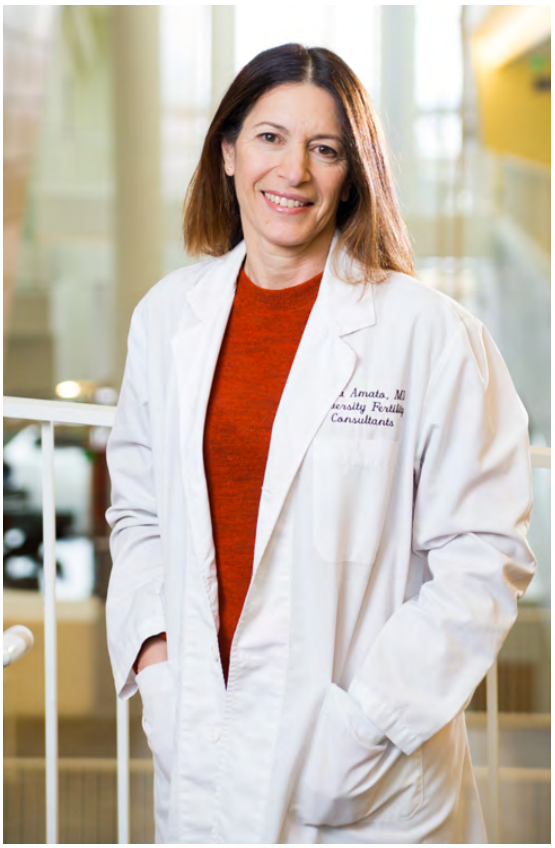
National Center for Transgender Equality: Social justice advocacy organization for transgender people, transequality.org

National LGBT Health Education Center: Provides education, resources and information to health care organizations to improve LGBT health care, lgbthealtheducation.org

Transgender Law Center: Civil rights group working to advance transgender self-determination, transgenderlawcenter.org

Transgender Youth Equality Foundation: Works to advance the rights of transgender, gender-nonconforming and intersex youths ages 2–18, transyouthequality.org

World Professional Association for Transgender Health: Promotes evidence-based care, education, research, advocacy, public policy and respect in transgender health, wpath.org



Dr. Paula Amato, an expert in fertility, includes transgender care among her focus areas.

Transgender Health Program class schedule

Gender-affirming surgery class

The THP offers **classes** on gender-affirming surgery. All classes are available as recorded videos. Your caregivers and loved ones are also welcome to register and attend our class.

Vaginoplasty/vulvoplasty classes feature slides and photos to review anatomy, genital reconstruction and surgical outcomes.

Classes are free, but registration is required. Please go to the website to register.

Fertility and assisted reproduction

We offer patient education content regarding fertility and reproductive options for gender-diverse people and their partners or allies in the next section of this booklet. You may also visit the OHSU Fertility Preservation website and review an overview of fertility options written by our Transgender Health Program expert, Paula Amato, M.D. Free video-based classes are also available regarding fertility preservation and assisted reproduction.

Transgender Health Program
Gender-Affirming Surgery Patient Education Program

Orchiectomy/vulvoplasty/vaginoplasty

Free video-based classes are available on the Transgender Health Program website.

This class is designed for patients, and welcomes the patient's support team of friends, family and/or health care providers.

Covered in class:

- Pre-surgery health and wellness
- Surgical options and how to choose
- How to prepare for surgery
- What to expect from surgery
- Recovery in the hospital
- Recovery at home

Registration is required. Visit ohsu.edu/transgender-health to register.

If you have questions or need help with registration, please contact us at **transhealth@ohsu.edu** or **503-494-7970**.

Fertility preservation

Vaginoplasty, vulvoplasty and orchiectomy all require removal of the testicles. Once the testicles are removed, you can no longer produce sperm. If you have not already frozen and stored a sample of sperm, you won't be able to have future biological children.

On average, transgender women want to become parents at the same rates as other LGBTQ+ people.

About half of transgender women wish they had preserved their fertility before transition. But only 3 percent of transgender people do so.

Please contact us if you're interested in learning more or want us to refer you to a sperm-banking clinic or fertility specialist.

Estrogen effects on sperm production

Long-term estrogen therapy harms sperm production. These effects can be permanent. Some studies suggest transgender women may have lower sperm quality and quantity even before starting hormone therapy.

- It's best to preserve fertility in someone who produces sperm — after puberty (sperm are not made until puberty) and before starting estrogen therapy. That is not always possible.
- Sometimes sperm production recovers after stopping estrogen for 3–6 months, but not always.
- Sometimes medications, such as **clomiphene citrate** or hCG injections, can stimulate sperm production.

Patients who are interested in fertility preservation and have been on estrogen for more than 6 months will typically be asked to stop estrogen for 3–6 months. You will then be asked to provide a semen sample through ejaculation. This sample will be looked at under a microscope to determine how many sperm are present, how active they are and if they have a normal shape. If these things are OK, you can bank sperm.

Collecting and storing semen

Sperm banking:

- Sperm are frozen and stored at a sperm bank. This is called cryopreservation.
- The semen (sperm) is obtained through ejaculation (by masturbation) or surgery (microscopic testicular sperm extraction; see below).
- The sample is looked at under the microscope to determine quality.
- Collecting and freezing sperm costs about $500–$1,000.
- Storing it costs $275–$500 a year. Sperm can be stored for many years.

Microscopic testicular sperm extraction:

- A sperm sample is taken directly from testicle tissue with surgery.
- It is often used if someone can't produce a quality sample through ejaculation. We may be able to do this when you have gender-affirming surgery.
- Collection costs $1,500–$1,800.
- The annual storage fee is $275–$500.

Using sperm for pregnancy

Intrauterine insemination (IUI): The sperm are washed and put into the uterus of the person who will carry the baby. A small catheter is guided through the cervical canal. The timing must align with ovulation. The hoped-for outcome is that the sperm swim into the fallopian tube and fertilize the egg, resulting in pregnancy. For this to be successful, the sample must have a lot of active sperm.

- This can be done in the fertility clinic.
- Cost is $300–$500 and requires a semen sample with a lot of active sperm.
- Many people who have been on estrogen therapy can't produce enough active sperm for intrauterine insemination to succeed. In this case, in-vitro fertilization (IVF) is necessary.
- The success rate of IUI and IVF depend on the age of the person providing the egg.

In-vitro fertilization (IVF): Fertilization is achieved by extracting eggs, retrieving a sperm sample and combining an egg and sperm in a lab dish. If successful, the fertilized egg becomes an embryo, and the embryo is transferred to the uterus.

- This is best for people who have low sperm production because it greatly increases the chance that a sperm makes it into the egg.
- Cost ranges widely depending on how many times you try to transfer an embryo (each time is called a cycle).
  - One cycle of transferring a fresh embryo typically costs $12,000–$17,000.
  - More cycles can be done if the embryos are frozen (see Frozen embryo transfer below).
  - Hormones and medications are often needed for the person with the eggs, costing an additional $3,000–$5,000.

Frozen embryo transfer (FET): Embryos not used in the first "fresh cycle" can be frozen for later use. This costs $3,000–$5,000 a cycle, plus an annual storage fee of $200–$500.

Fertility preservation FAQ

Will insurance cover the cost of fertility preservation?

Most insurance companies don't cover the cost for transgender people who want to preserve fertility before gender-affirming surgery or hormone therapy. Insurance sometimes covers the cost for people with certain cancers undergoing medically necessary cancer treatments that negatively affect fertility. We hope insurance soon covers the cost for transgender folks undergoing medically necessary gender-affirming treatments that negatively affect fertility.

If my partner doesn't have a uterus or can't carry the baby, what are my options?

Surrogacy is the most widely used option to have a biological child in this situation. With surrogacy, a person with a uterus (the surrogate) agrees to bear a child for another person who will become the child's parent after birth. This often involves a legal agreement. Surrogacy costs $90,000–$130,000.

Adoption is another option. Adoption through an agency costs about $30,000. Adoption from an expectant mother costs $15,000–$40,000. Adoption from foster care is essentially free but comes with its own challenges.

What about uterine transplant?

A donor's uterus can be transplanted into another person's body. This allows the recipient to carry a child. There have been a few successful uterine transplants in ciswomen worldwide. Most took place in countries that do not allow surrogacy. Uterine transplant may be available to transgender women in the future.

How much does fertility preservation cost altogether?

Preserving sperm alone costs roughly $1,500–$2,000 to collect and store for the first year, then $500 a year to store. The cost of storing the sperm and using it for pregnancy can vary greatly depending on many factors. These include:

- The semen sample's quality
- The age of the person providing the egg
- Whether intrauterine insemination or in-vitro fertilization is needed
- How many attempts are needed to achieve pregnancy

This may not seem like an option for many people because of the cost. But insurance coverage of treatments is always changing, and this may be covered in the future. If having a biological child is important to you, consider sperm banking now, with the hope of more affordable options soon.

More online resources:

- transcare.ucsf.edu/guidelines/fertility
- familyequality.org/family-building/trans-family-building

Notes

OHSU accepts most health plans.
OHSU is an equal opportunity, affirmative action institution.

HCM 21717208 4/23