Women and Diversity Health

GUIDE TO URINARY HEALTH



2025

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Women and Diversity Health

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Introduction

While the urinary system works similarly for everyone, health concerns and care needs differ for those with a vulva and vagina. The urinary tract is a system in the body responsible for making, storing, and removing urine. The system includes the kidneys, ureters, bladder, and urethra that work together to filter and remove waste from the bloodstream, maintaining the body's balance of fluids and electrolytes. The bladder is the hollow, muscular organ that stores urine. The bladder's size is different for everyone but can usually hold about 375ml to 500ml of urine.

Hydration And Dehydration

Staying well hydrated by drinking water regularly helps keep your urinary system healthy, speeds recovery from exercise, and improves your overall performance.



BENEFITS OF HYDRATION

- Prevents the buildup of salt and minerals, reducing the risk of kidney stones.
- Flushes out harmful bacteria, lowering the risk of Urinary Tract Infections (UTI's).
- Supports regular bowel movements and prevents constipation.
- Maintains a healthy balance of electrolytes like sodium, potassium, and chloride, supporting muscle and brain function.
- Hydrated urine is less concentrated, reducing bladder irritation and the urge to urinate frequently.
- Helps regulate body temperature through sweat, reducing the risk of heat exhaustion or heat stroke.
- Improves focus and coordination, making tasks like handling weapons or machinery safer.
- Aids the body in adjusting to pressure changes, such as when working underwater or at high altitudes.

Dehydration occurs when your body loses more water than it takes in, which can harm your urinary system and work performance.

Signs of Dehydration:

- Thirst
- Dry lips and mouth
- Dry skin
- Headache
- Dizziness or light-headedness
- Feeling tired
- Increased heart rate
- Darker urine colour



If you have any of these symptoms, it's important to act quickly by drinking more water. Water is the best choice for rehydration. Generally, 375ml of water is recommended for every 30 minutes of exercise. Straw colored urine is the best way to know that a person is well hydrated.

Urine colour chart

	Doing OK. Drink water as normal.
	You could drink a small glass of water now.
	Drink about 250ml of water soon or drink a whole 500ml bottle of water if you are outside and/or sweating.
	Drink about 250ml of water right now or drink a whole 500ml bottle right now if you're outside and or sweating.
	Drink one litre of water right now. If your urine is darker than this or red/brown, then dehydration may not be your problem and you should contact your health care provider.

Urinating

As the bladder fills and stretches, it sends nerve signals to the brain which tell you to urinate. Most people urinate every three to four hours and some people get up to urinate once at night.

Urination Challenges

In the military environment it can be challenging to urinate regularly. Examples include:



Travelling within an aircraft where the bathroom is not easily accessible.



During a critical task that requires focus.



While working within a demanding or risky operational environment.

Persons who must sit or squat to urinate may face additional challenges when indoor bathroom facilities are unavailable:

- They need to partially undress, which takes more time and increases skin exposure. This can be challenging in cold or wet environments or where there are biting insects.
- Personal protective equipment (PPE) may need to be removed which can be tricky in confined spaces like portable toilets or pit toilet areas.
- Squatting to urinate strongly engages the muscles in the thighs, groin and pelvic floor which could stop the bladder from fully emptying.



PUBLIC WASHROOMS ASSIGNED MALE OR FEMALE OFTEN CAUSE PERSONAL AND SOCIAL DISCOMFORT FOR INDIVIDUALS WHO DO NOT FIT WITHIN THE GENDER BINARY, AS THEY MAY FEEL UNWELCOME IN EITHER SPACE. THIS CAN LEAD TO PROLONGED PERIODS OF HOLDING URINE AND BOWEL MOVEMENTS, WHICH MAY IMPACT THEIR HEALTH.

Don't Ignore The Urge To Urinate



Loss of concentration:

You may become distracted, irritable, and make errors as you struggle to focus on your tasks.

Risk of UTIs:



Poor bladder muscle function can prevent the bladder from fully emptying, increasing the risk of urinary tract infections.

IGNORING THE URGE TO URINATE CAN HAVE MORE CONSEQUENCES THAN JUST TEMPORARY DISCOMFORT.



Bladder weakness and leakage:

Holding urine can overstretch the bladder, potentially leading to bladder muscle weakness and leakage (incontinence).

Bladder irritability:



Will increase the urge to urinate more often.

Overcoming Urination Challenges

Planning and preparing for urination challenges in military environments include:

- Scheduling time and secure transport if the only available bathroom facilities are a long distance away.
- Bringing body cleansing wipes to clean yourself (wipe down or front-to-back).
- Use a urination device that allows you to stand while urinating (see Field Urination Devices below)
- When urinating in the squat position, breathe in just beforehand to relax the pelvic floor and then exhale through your mouth while gently pushing. Waiting a few more seconds to fully empty your bladder can also help.

DID YOU KNOW?

Alcohol, caffeine and carbonated beverages are diuretics that make you urinate more. If you think this is affecting you, consider switching to other beverages.

Some blood pressure medications (like hydrochlorothiazide) may also lead to frequent urination. Consult your care provider if you feel your medications may be causing you problems in your work setting.

Field Urination Devices (FUD)

A urination device is designed to fit over a vulva allowing an individual to urinate in a standing position and reduces the need to undress in challenging environments. The plastic or silicone funnel collects urine as it leaves the body, channeling it away through a spout. Try using the device in the comfort of your home before relying on it in a work or operational setting. For cleaning after use, follow the manufacturers' instructions.

DID YOU KNOW?

There are many different urination devices on the market. Eligible members can claim the purchase costs of a FUD of their choice every two years. The chosen device must be made of medical grade material which repels fluid and prevents the growth of bacteria, helping to keep it clean between uses. For more information on the policy, see CANFORGENS (mil.ca)

Urinary Tract Infections

A urinary tract infection (UTI) is an infection that occurs in any part of the urinary system, which includes the kidneys, ureters, bladder, and urethra. UTIs can range from mild and annoying to severe and potentially life-threatening if the infection spreads to the kidneys.

Factors within our control that increase the likelihood of UTIs include not drinking enough fluids (dehydration), the bladder not being fully emptied, not urinating after sexual activity and constipation.

Factors outside of our control include:

ANATOMY

A short urethra allows harmful bacteria around the anus and vulva to travel to the bladder.

AGE

Adults over 60, and those transitioning through menopause.

HORMONES

Fluctuations during menopause and pregnancy.

STRUCTURAL DIFFERENCES

Kidney stones or abnormalities from birth can increase the risk of UTIs.

PRE-EXISTING HEALTH CONDITIONS

Enlarged prostate in transgender women can inhibit bladder emptying. HIV/AIDS, diabetes, and cancers can suppress the immune system.



Symptoms of a UTI include:

- Pain when urinating.
- Frequent and urgent need to urinate, including more at night.
- Bloody or cloudy urine.
- Lower abdomen pain.

SEE A HEALTH CARE PROVIDER FOR DIAGNOSIS IF YOU FEEL YOU MAY HAVE A UTI. PRESCRIPTION ANTIBIOTIC TREATMENT MAY BE CAPSULES OR A POWDER MIXED INTO WATER, AND IN UNCOMPLICATED CASES TYPICALLY RESOLVES PAIN AND OTHER SYMPTOMS WITHIN A DAY OR TWO.

DID YOU KNOW?

Estrogen treatment has been proven to help reduce UTIs after menopause. Estrogen treatment comes in the form of a cream that can be applied to the vagina or as a ring or tablet that can be inserted into the vagina. These treatments may also help individuals with vaginal dryness related to menstrual suppression, testosterone therapy, or after childbirth. Talk to your healthcare provider for more information.



Pain or Bleeding With Urination

Besides UTIs, there can be other causes of pain or bleeding with urination. Sexually transmitted infections like chlamydia, gonorrhea, or herpes cause burning with urination. Kidney infections (progressing from an untreated UTI) usually include fever and back pain. Bright red bleeding with urination may be related to conditions like kidney stones, kidney disease, and bladder cancer. Talk with your health care provider to identify the cause and discuss treatment options.

The Pelvic Floor

The pelvic floor describes a group of muscles and ligaments that sit in the lower part of the pelvis. These support the internal organs, as gravity tries to pull them down.

Pelvic Floor Dysfunction



Underactive (hypotonic) pelvic floor muscles can become weak or stretched due to factors like aging, pregnancy, menopause, straining during bowel movements, constipation, and being heavier around the abdomen. Weak pelvic floor muscles may provide less support for the vagina and uterus, leading to pelvic organ prolapse (see below). Lack of support for the bladder, rectum and anus can also lead to urine or stool leaks (incontinence) during activities like exercise, coughing or laughing.

Overactive (hypertonic) pelvic floor muscles that are too tight or unable to relax properly are often caused by overuse (such as excessive exercise) or chronic stress leading to muscle clenching. This condition can result in symptoms like pelvic pain, difficulty urinating, constipation, and sexual discomfort.

Maintaining Pelvic Floor Health

Pelvic floor exercises, known as Kegel exercises, can help improve the function of pelvic floor muscles. For individuals with underactive or low tone pelvic floor dysfunction, strengthening the pelvic floor muscles can aid in the prevention or treatment of incontinence or prolapse. Regular practice for at least one to three months is usually needed to see improvement. These can be started at any age to maintain good pelvic floor function and reduce the risk of developing problems in the future.

For those experiencing overactive pelvic floor dysfunction, Kegel exercises may worsen symptoms. Instead, focusing on relaxation techniques and working with a physiotherapist qualified on pelvic floor rehabilitation to address muscle tension will improve pelvic floor function.

A strong pelvic floor is especially important for those in roles with lots of high impact activities, sudden jolts, prolonged physical activity or prolonged standing. Physiotherapists qualified in pelvic floor rehabilitation are available to help set a discrete, personalized exercise routine and teach appropriate technique.

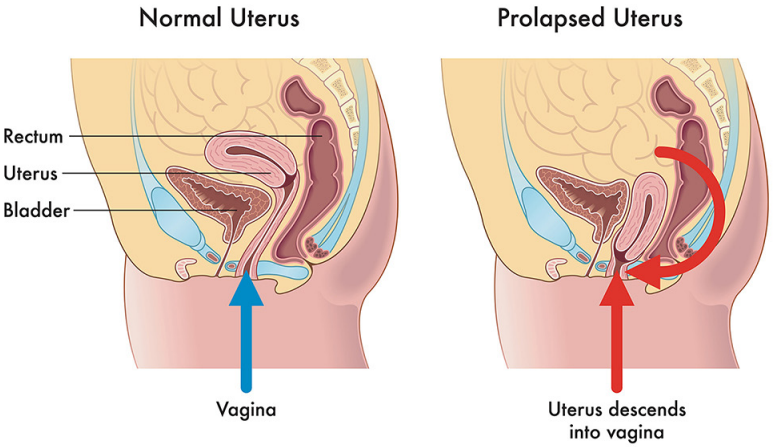


IF YOU EXPERIENCE CHRONIC VAGINAL OR PELVIC PAIN, CONSULT A HEALTH CARE PROVIDER BEFORE BEGINNING PELVIC FLOOR EXERCISES

Pelvic Organ Prolapse

Pelvic organ prolapse is when one or more of the organs in the pelvis slip down from their normal position and bulge into the vagina or protrude out. It can be uncomfortable, causing low back pain, vaginal pressure, vaginal bleeding and it may increase urinary and stool leakage. Up to 40% of women or persons with a uterus will have some degree of pelvic organ prolapse. Fortunately, it is less noticeable before menopause, but it can occur in those who are younger or postpartum (sometimes temporarily after delivering a baby). Prolapse is not dangerous but can be alarming as you may feel something protruding from the vagina or bulging. The bulge may be from the front (cystocele) or back (rectocele) wall of the vagina. This can be noticed especially when straining, squatting, coughing, or after standing for most of the day.

Mild prolapse often has no symptoms and treatment is not always needed. For those who experience any symptoms of prolapse, medical assessment can determine if symptoms can be improved with pelvic floor rehabilitation, estrogen treatment, a pessary (vaginal disc to support the pelvic organs), constipation management or minimally invasive day surgery.



Consult your health care provider if you have any of the following symptoms:

- Sensations of fullness, dragging or discomfort in the vagina.
- Bulging out from the vagina that interferes with activities.
- Increasing urinary leakage or bowel problems.
- Discomfort when having sex.

Pelvic Floor And Menopause

The hormone estrogen plays an important role in keeping the tissues within the pelvis healthy. With reduced hormone levels that accompany menopause the tissues can become dry and weak and fail to provide the same level of support. Pelvic organ prolapse, urinary incontinence and UTIs become more common post-menopause. See the Menopause Guide for further discussion about risk reduction and treatments you and your health care provider may consider.

Incontinence

Incontinence is when a person leaks urine or stool. Incontinence can vary from leakage of a few minor drops to soaking through underwear and pants. Incontinence is not limited to a specific group of people and can affect anyone, including those who are young, fit, and healthy. Even though it is common, it is not often discussed, and it can cause a lot of stress and worry.

Stress Incontinence



Stress incontinence may happen during physical activities that increase pressure in the abdomen such as exercising, coughing, laughing or sneezing. Stress incontinence and feeling the need to urinate often are also common during pregnancy. Physiotherapists qualified in pelvic floor rehabilitation have special training in supporting urinary leakage, in addition to recovery from childbirth, and painful sex. Pessaries, limiting beverages that make you urinate more, and surgical day procedures can also be helpful.

Urge Incontinence



This is when a person experiences a sudden and intense urge to pass urine and is unable to hold it in. The walls of the bladder include a muscle (the detrusor) which relaxes and stretches as the bladder fills, then contracts to push the urine out when an individual begins to urinate. The muscle can contract too often creating an urgent need to urinate. Drinking too much alcohol or caffeine, dehydration (causing concentrated urine which irritates the muscle) or being constipated may all cause symptoms of urge incontinence.

Incontinence can be improved with medical help ranging from exercises, weight loss (if indicated), or medications. Simple measures like reducing caffeine, drinking fluid regularly, and increasing fiber within your diet can help. Absorbent period or incontinence underwear can also be helpful.

DID YOU KNOW?

Entitled female, intersex and transgender members are eligible for reimbursement of the purchase costs of the underwear of their choice each fiscal year. This includes menstruation or incontinence type leakproof underwear. For more information on the policy, see Frequently Asked Questions about clothing CANFORGENS (mil.ca).

Resources

Canadian Continence Foundation: About Bladder Health
https://www.canadiancontinence.ca/urinary-incontinence

Just for You – Women (Health Canada)
https://www.canada.ca/en/health-canada/services/healthy-living/just-for-you/women.html

Society of Obstetricians and Gynecologists of Canada (SOGC)
https://sogc.org/

Women's Health Coalition
https://thewhc.ca/resources/



WOMEN AND DIVERSITY HEALTH

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