

# WOUND CARE

## INTRODUCTION

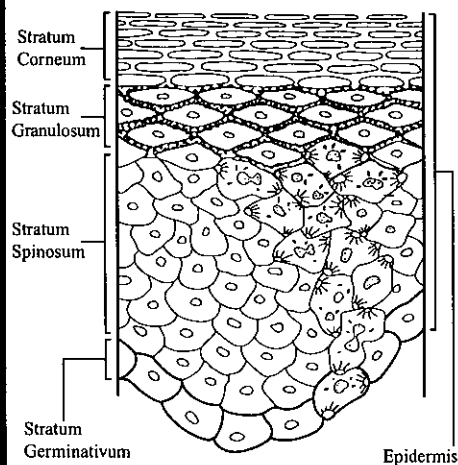
This guide is designed to teach and inform about wounds and their care. The first section covers the **structure of the skin** and describes **general facts** about wounds. **Chronic wounds** and their treatment are described on the inside pages, including **diabetic foot ulcers**. **Venous leg wounds** and wound care **products** are detailed on the back page. Your **healthcare provider** is the best source of information about taking care of your skin. Always check with your healthcare provider if your wound is deep, you don't know how you got it, you think it may be infected, or it isn't healing as expected.

## GLOSSARY

<b>abrasion:</b>	wearing away of the skin through some mechanical process (friction or trauma)
<b>abscess:</b>	accumulation of pus enclosed anywhere in the body
<b>cellulitis:</b>	inflammation of the tissues indicating infection
<b>collagen:</b>	main supporting protein of the skin
<b>debridement:</b>	removal of foreign material and dead tissue from a wound
<b>edema:</b>	swelling
<b>epidermis:</b>	outer layer of the skin
<b>erythema:</b>	diffuse redness of the skin
<b>eschar:</b>	thick crust of dead tissue, scab
<b>exudate:</b>	accumulation of fluids in a wound
<b>full-thickness:</b>	tissue damage extending through the dermis
<b>granulation:</b>	formation of connective tissue and many new capillaries; looks red and rough
<b>necrotic:</b>	dead
<b>partial thickness:</b>	wounds that extend through the epidermis but not through the dermis
<b>pus:</b>	thick fluid made up of white blood cells and bacteria
<b>slough:</b>	stringy, necrotic tissue; usually yellow
<b>ulcer:</b>	loss of skin with definite edges
<b>wound:</b>	break in the skin

## ANATOMY

### Structure of the Skin



The skin is the largest body organ. It varies in thickness from **very thin** (such as on the eyelids) to **quite thick** (as on the soles of the feet). The **epidermis**, or outer layer of the skin, sheds layers and replaces itself every 4-6 weeks. The **dermis** is the layer under the epidermis containing blood vessels and nerves which provide strength and support to the skin. Below the dermis lies **subcutaneous tissue**, providing a cushion and nutritional support for the skin. All layers of tissue below the epidermis are moist; this is why wounds heal three to five times faster when slightly moist than when kept dry.

### Function of the Skin

The skin provides **protection** from ultraviolet radiation, infections and other harmful things. **Nerve endings** in the skin allow us to feel pain, touch, pressure, heat and cold. The skin helps control our body temperature and helps produce vitamin D when exposed to sunlight.

The body is constantly exposed to factors that can **damage** the skin. **Ultraviolet radiation** from **sunshine** or **tanning lights**, irritating **chemicals** we handle at work or in the home; even the drying effects of **home heating systems** and use of **alkaline soaps** can contribute to skin problems. Adequate nutrition and fluid intake are needed for healthy skin. Gentle **cleansing**, use of **moisturizer** on dry areas, and consistent use of **sunscreen** lotion can help your skin stay healthy.

## DEFINITION

### What is a Wound?

A wound is a break in the skin caused by **disease, trauma, burns** or **other injuries**. Some common minor wounds are scrapes, small cuts and blisters from tight shoes. Usually the body heals quickly after a minor wound, sometimes without needing medical care. An **acute** wound is one that happens suddenly. The cause of the wound is known, and it heals in an orderly way. A **chronic** wound is one that persists for a number of months or comes back again after healing initially. Many diseases can cause a chronic wound or affect your body's ability to heal.

### Skin Damage Severity

Sometimes healthcare providers describe the depth of the injury in these terms:

- **Partial Thickness:** The wound extends through the epidermis and into the dermis.
- **Full Thickness:** The wound extends through the dermis and epidermis and may affect underlying structures such as subcutaneous tissue, muscle, and bone.

### How Do Wounds Heal?

After an injury, a complex series of events starts the process of tissue repair. **Cells** in the skin and **blood vessels** work to stop bleeding, clean up the wound and begin to close it. Some of the cells important to this process are **white blood cells**, **platelets**, **fibroblasts**, and **epithelial cells**. Shallow wounds can begin to cover with new skin within just a day or two, while deep wounds must first fill with new connective tissue, which looks dark red and rough. New blood vessels are formed and the edges of the wound begin to pull together in a process called **contraction**. The wound eventually covers with new pink skin cells from the outer edges toward the center. Up to a year after a deep wound has healed, the scar continues to change as the body remodels the new tissue.

### Home Care for Minor Wounds

- Apply pressure and elevate the area to stop any bleeding
- Flush out dirt and debris with clean running water
- Apply a bandage to cover and protect the area
- Change the bandage when it loosens from the skin or the absorbent pad is filled with drainage
- Seek medical care if the wound is deep or may need stitches

## THE BASICS (CONT.)

- Wash your hands before and after wound care.
- Wear gloves when doing wound care for someone else.

**Some swelling, redness and pain are common with all wounds and normally will go away as the wound heals.**

### Correct Use of Simple Bandages and Tapes:

- **Apply** tape gently. Do not pull the tape tightly because tension can damage the skin.
- When **removing** tape or adhesive bandages, push down on the skin and slowly lift the tape. Sudden removal can tear fragile skin.
- Follow manufacturer's directions for product use. Many of the newer wound care products can be left in place for several days at a time. It is not always necessary to remove and replace the dressing each day.

### See Your Healthcare Provider If:

- You have a **traumatic injury** (stitches may be needed)
- A minor wound won't stop **bleeding** (after holding pressure to it at least 10 minutes)
- **Burns** cause blistering or skin loss
- Human or animal bites break the skin
- Insect bites become **dark** in the center or very red and swollen
- You have **signs of infection** (thick drainage, increasing redness or swelling around the wound, severe pain, fever and chills).
- You have not had a **tetanus shot** in the past 5 years
- You have an **unexplained wound** or one that is **not healing** as expected

### Questions to Discuss with your Healthcare Provider:

What caused this wound?

Is it infected?

What can I do to help it heal?

How long does it usually take to heal this type of wound?

How often should I clean the wound and change the bandage?

### Wounds Healing by Granulation (secondary intention):

Some types of wounds require that the doctor make deep surgical incisions which are sutured in the deepest layers, with the upper portions left open. This allows fluid to drain and prevents formation of an abscess.

## Quick Study

### THE BASICS

The wound is **not usually painful** and can close in several weeks when nutrition is good and proper wound care is used. A bandage that keeps the wound slightly **moist** will help it heal faster than a dry bandage. You may be able to **wash** the wound in the shower. Check with **y o u r** healthcare provider for **s p e c i f i c** instructions.



### CHRONIC WOUND CARE

This section of the guide gives general information about **cleansing and dressing chronic wounds**. Always consult your healthcare provider before making a change in caring for your chronic wound and with any questions about the progress of the wound.

### What to Expect When You See Your Healthcare Provider About a Chronic Wound:

You will be asked how the wound **started**, how **long** you've had it and how it has been **treated**, as well as questions about your **general health** and other **medical conditions** you may have. **Before the appointment**, be sure to think about the answers to these questions; it is very helpful to **write them down** ahead of time. Also, be sure to gather and bring any **pertinent health records** you may have.

- The wound will be **examined** and **measured**
- The area around the wound will be **examined**
- **Diagnostic tests** may be ordered, such as: x-ray, MRI or CT scan, vascular studies, blood tests, samples of fluid or tissue from the wound
- The **oxygen pressure** around the wound may be measured
- **Medications** may be prescribed if infection is suspected
- The wound may be **debrided** (debris and dead tissue removed)
- You will be told how to **clean** and **bandage** the wound
- You may receive a referral for continuing care from other providers as needed. Some other providers include, but are not limited to:

**Dermatologist**

**Dietician**

**Infectious Disease Specialist**

**Podiatrist**

**Rheumatologist**

**Surgeon**

**Wound Care Nurse**

### CHRONIC WOUND CARE

### Factors That Can Contribute to Slow Wound Healing:

- Repeated use of **harsh antiseptics** (hydrogen peroxide and povidone iodine for example)
- Poor nutrition
- Smoking
- Untreated infection
- Uncontrolled diabetes
- Diseases that affect the immune system
- Use of **certain medications**, such as anticoagulants and steroids
- Continued injury to the area
- Failure to treat the cause of the wound

### General Guidelines for Care of Chronic Wounds

- Treat the **cause** of the wound
- Prevent **further injury** to the area
- Improve your body's ability to **heal**
- Treat **infection**, if present
- Remove **necrotic tissue**, if present
- Cleanse the wound with **saline** or nontoxic **wound cleansers**
- Use dressings that provide a slightly **moist wound surface**

### PRESSURE ULCERS

A pressure ulcer is an area of tissue that is damaged when soft tissue is pressed between a **bony area** and **another surface** for a long time. Pressure ulcers happen most commonly over a bony area such as the tailbone, buttock, hip, or heel in people who can't move themselves around because of illness or injury. The **amount** of pressure placed on the area, **how long** it is pressed, and the person's **overall health** all have an effect on the amount of skin damage. Once the injury has occurred, it can take weeks or months to heal.

**Pressure ulcers can often be prevented. Here are some of the things you or your care giver can do to help:**

- **Look at the skin.** Inspect the skin at least once a day, paying special attention to areas over the bony areas of the hip, tailbone, heels, elbows and ankles. If red areas are developing, be sure to turn more frequently and consider use of special cushions to reduce pressure. Do not use heat lamps or massage red areas. These practices can further damage the skin.
- **Keep the skin clean.** Use gentle soap and a soft cloth to wash soiled skin. Don't allow urine or stool to stay on

DIABETIC FOOT WOUNDS (CONT.)

infected. Wounds that have been debrided **heal more quickly** than those with excess necrotic (dead) tissue. If you have excess callus around the area of the foot wound, your provider may remove it to reduce pressure and improve healing. The wound will be **measured** and some **diagnostic tests** (x-rays and lab tests) may be done. If the ulcer is on a weight-bearing part of your foot, you may be asked to use a **special boot or cast**, or to keep your feet elevated for a period of time. **Pressure relief** is very important to healing diabetic foot wounds on weight-bearing surfaces, so tell your healthcare provider if you can't follow their instructions. A **bandage** will be applied to your wound; its main purpose is to provide a slightly moist surface to aid healing. **Dressings** absorb excess drainage, help the wound stay clean and help prevent infection. Sometimes **medicated gels or creams** are used on diabetic foot ulcers.

HEALING LEG WOUNDS

There are many diseases that can cause ulcers on the lower parts of the legs. The most common is **venous disease**. **Venous** ulcers are caused by vein damage. Blood collects in the legs, causing swelling and weeping wounds. The skin on the legs can become discolored and look stained brown. **Arterial disease** can also cause wounds on the lower part of the legs. **Arterial disease** makes wounds hard to heal because the blood flow to the wounds is reduced.

**Care of Venous Leg Wounds**  
If you have a wound that won't heal on your lower leg, see your healthcare provider, who will determine the cause of the wound and begin treatment. If the wound is due to **venous disease**, the following recommendations may be made:  
**Reduce the swelling in your legs.** This will help the wound heal. Your healthcare provider may apply special

HEALING LEG WOUNDS

wraps to the legs or may ask you to wear stretch support stockings.

- A **prescription** is necessary for stockings, and they will need to be sized by a certified fitter.
- Sizing will be more accurate when done in the **morning**.
- It is also helpful to **raise your legs periodically** throughout the day. Sit in a recliner with your legs up or use a footstool. Avoid prolonged standing or sitting.

**Help Your Body Heal**

- Do not smoke.
- Do not use alcohol excessively.
- Keep the wound clean and dressed as directed.
- Do not scratch your legs. If itching is a problem, discuss treatment options with your healthcare provider.



WOUND CARE PRODUCTS

PICTURE	PRODUCTS	DESCRIPTIONS/INDICATIONS	HOW TO USE
	<b>Alginate Dressing</b>	Absorbent dressing for use when the wound has moderate amount of drainage. Available as flat pads or rope.	Gently cover the wound with the alginate, then apply an absorbent dressing such as gauze. Change it daily or when the drainage shows through the outer layer of the bandage.
	<b>Hydrogel Dressing</b>	Water or glycerin-base nonadherent dressing that helps keep wounds moist. Available in a tube of gel and in flat sheet dressings.	Apply the sheet dressing to the wound or, if using gel from tube, apply a 1/8 inch layer of gel over the surfaces of the wound. Cover with an absorbent dressing. Change it when drainage shows on the outer layer of the dressing.
	<b>Hydrocolloid Dressing</b>	Adhesive, moldable wafer which often has a waterproof backing. The adhesive does not adhere to the wound. Widely used in care of chronic wounds. Available in various shapes and sizes.	Remove the paper backing and apply the adhesive side of the dressing to the skin. Use a dressing at least 2 inches larger than the wound so the dressing can stick to intact skin all around the ulcer. Change the dressing when the wound drainage reaches the edge or the dressing begins to lift.
	<b>Wound Cleanser</b>	PH balanced formulas that clean and deodorize the wound. Alternative to saline and harsh antiseptic cleansers.	Spray the surface of the wound after removing the dressing. Dry the surrounding skin before applying the new dressing.

Photos courtesy of  Hollister.

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# INCONTINENCE CARE

## INTRODUCTION

Urinary incontinence is the inability to control urination. It can range in severity from slight leakage to total loss of bladder control.

This chart is designed to help you understand the causes of incontinence and give helpful hints on its management. **This information is not a substitute for professional medical care.** Always consult your physician if problems arise.

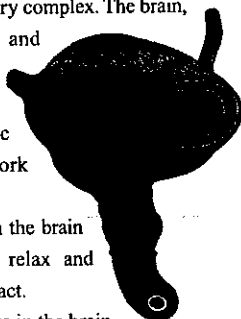
It is estimated there are over 13 million incontinent adults in the U.S. today. Women are twice as likely to have this condition as men. Children may also have bladder control problems. Urinary incontinence is treatable and usually does not require surgery. Some causes of incontinence include muscle weakness, an enlarged prostate blocking the urethra and diseases or injuries involving nerves and muscles. Pregnancy, bladder infections and certain medications may temporarily cause incontinence.

## NORMAL CONTROL OF URINE

- Urine control is very complex. The brain, spinal cord and muscles of the bladder, urethral sphincter and pelvic floor must work together.

- Urine is stored when the brain makes the bladder relax and pelvic muscles contract.

- When control centers in the brain quiet, the pelvic muscles relax, and the bladder can squeeze and empty.



**BLADDER**

Medications that can affect bowel or bladder control:

Diuretics	Anti-hypertensives
Sedatives	Antihistamines
Narcotics	Antidepressants

## TYPES OF INCONTINENCE

### Stress Incontinence:

- Occurs when the pressure closing the bladder is greater than the pressure in the urethra.
- Results in loss of urine while coughing, laughing or changing position.
  - Most prevalent in women, especially after childbirth and hysterectomy.
  - Occurs when the muscles and tissues closing or supporting the urethra are weak or damaged, such as with childbirth, weight gain or some types of surgery.
  - May worsen with altered levels of estrogen during the menstrual cycle or after surgical or natural menopause.
- Surgery is designed to restore the normal position of the bladder and/or the bladder neck and urethra.

### Urge Incontinence:

- An overwhelming urge to urinate followed by the release of a sometimes large amount of urine.
- Caused by bladder wall spasms. Also described as *unstable, spastic or overactive*.
- Can be set off by the sound of running water, walking past a favorite bathroom, returning home, or sudden bladder filling due to alcohol or other diuretics.
- Common after menopause and in older persons when the bladder muscle is more irritable.
- Also common when MS, diabetes, stroke or Parkinson's interrupts control messages from the brain's higher centers.
- Irritation sometimes increased by concentrated urine from inadequate fluid intake, or by caffeine, citrus juice, artificial sweeteners, or spicy foods.
- Usually not related to excess urine in the bladder but rather to an irritated bladder muscle from infection, bladder calculi (stones), polyps or cancer.

### Overflow incontinence:

- Leakage of typically small amounts of urine when the pressure in an overfull bladder overcomes the pressure in or around the urethra.
- May cause urine to flow back up into the kidneys, damaging or destroying them.
- Usually due to either a bladder that contracts weakly or a blockage of the urethra.
- Common in men with an enlarged prostate, especially when taking cold medications.
- Nerve damage due to diabetes, spinal injury, MS or a birth defect may prevent bladder wall muscle from contracting or prevent muscles that close the urethra from relaxing.
- Treatments include medication review, surgery to remove obstruction, clean intermittent catheterization, and as a last resort, indwelling catheterization.
- Urethral blockage may cause bladder spasms/instability over time that persists after prostate surgery.

### Functional Incontinence:

- Occurs in people with borderline bladder control who are **unable** to reach the toilet in time because of **physical problems** like arthritis or muscles affected by a stroke.
- Also caused by **environmental barriers** such as stairs, distance or crowds preventing timely access to bathroom.
- May occur in those with **dementia** or **severe depression** who don't remember how to get to the bathroom or even care about it.
- Offering **assistance** to get to the bathroom every 1 to 2 hours and a drink of water following use of the toilet may correct this.
- Having a **commode** nearby or keeping the route to the bathroom free of obstacles and well lit may also help.

### Fecal Incontinence (loss of normal bowel control):

- There are over 1 million people in the US suffering from fecal incontinence.
- Commonly caused by chronic constipation from inadequate fiber and fluids.
- May also be caused by a weak anal sphincter.
- Ignoring the first urge to have a BM causes the stool to dry out, increasing constipation.
- When unable to expel hard rectal contents, liquid stool higher in the intestine may move past the obstruction giving the appearance of diarrhea.
- A full rectum also may press against the bladder or urethra, and cause urinary problems.

## EVALUATION OF INCONTINENCE

### Evaluation of Incontinence:

- Focused history and physical examination.
- Analysis of a urine sample.
- A toileting diary covering several days, recording toilet use and accidents.
- Stress test – observation of leakage with activity.
- Measurement of urine in bladder after urinating.

### Specialized tests not part of basic evaluation:

- Urodynamics: Determination of functional status of urinary bladder and urethra.
- Cystoscopy: A narrow telescope like tube is used to help in identifying lesions, pouches, holes and blockages.
- Imaging: Examines the bladder, ureters and kidneys for lesions and blockages.

### Summary of information collected to diagnose possible causes of incontinence:

- Focused history
- Physical examination
- Analysis of urine sample
- A diary, covering several days, recording toilet use and accidents
- Estimate of urine left in bladder after emptying it.

## CATHETERIZATION

### Indwelling catheterization

Indicated only when urine output must be closely monitored, incontinence hampers healing of a stage 3 or 4 pressure ulcer, in the terminally ill to avoid undue pain or trauma, or as the last resort to avoid institutionalization.

- Insertion is a sterile procedure to prevent UTI.
- Use the smallest catheter that drains well (14 or 16 Fr.).
- Avoid balloons > 10 ml unless for hemostasis.
- Base catheter changes on patient need, not a predetermined interval.
- Urine may leak around catheter because of bladder spasms, too large a catheter or balloon, catheter blockage or infection.

### Intermittent self-catheterization

- Far safer over time than an indwelling catheter.
- Clean technique and washing catheter with soap and water is recommended.
- Catheter guides, grasp aids and mirrors may assist females but should be ultra portable to avoid postponing catheterization.

## SKIN CARE

- Urine and especially feces can seriously damage skin if allowed to remain.
- Use absorptive products with polymer gel and change when wet.
- Wash skin with incontinence wipe or cleanser but avoid excess friction. Avoid soap as it removes natural protective lubricants.
- Barriers such as the petroleum based products and zinc oxide protect against breakdown.
- Skin breakdown or pressure ulcers (bedsores or decubiti) are increased with mobility limitations.
- Collection devices help when treatment fails. There are many types (disposable & reusable): liners, drip collectors, condoms, pads, guards, undergarments, briefs and bed pads. Device should be comfortable and discreet, and keep skin, clothes and furniture dry. Overpadding damages skin and reduces leakage awareness.

(Also consult BarCharts® Wound Care Guide.)

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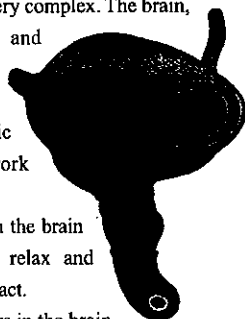
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(Also consult BarCharts® Wound Care Guide.)

# OSTOMY CARE

## INTRODUCTION

This chart is designed to help you understand the definition of an **ostomy**, aid with the day-to-day care, and offer helpful hints in **ostomy management**. After a recovery time of a month or two, most people resume their normal life styles. Your doctor, enterostomal therapist (ET) or medical professional should always be consulted if problems arise, or if you have any concerns regarding the stoma, the skin surrounding the stoma, or your pouching system.

## WHAT IS AN OSTOMY?

An **ostomy** is necessary when normal function of the bowel or bladder is lost.

- It is a **surgical opening** in the abdomen where the intestine is brought up through the abdominal wall, and a stoma is created.
- Its purpose is to divert waste to the outside of the body, where it can be expelled into a pouch. Normal recovery time for this procedure is 6-8 weeks.



- Colostomy
- Ileostomy
- Continent Diversions
- Urostomy

**NOTE:** There are no nerve endings in the stoma, so there is little or no sensation or feeling.

About 6-8 weeks after surgery, your stoma will shrink to its permanent size. When cutting the pattern hole in the wafer, you may need to adjust the size over time. If you wear a pre-cut opening, you may need to change the pouching system altogether.

## COLOSTOMY

**Colostomy:** A portion of the large intestine is removed or by-passed. The remaining portion of the functioning large intestine (colon) is brought through the abdominal wall, creating a stoma.

- When the colostomy is temporary, the surgery bypasses a portion of the colon that is damaged in order to expedite healing.
- When the colostomy is permanent, it assumes the function of that portion of the colon that was removed.
- The most common reasons for a permanent colostomy are **colon cancer, rectal cancer or trauma**.
- The **output** from a colostomy (stool) will vary in consistency from watery and pasty to firm, depending on the location in the colon where the surgery was performed.

## ILEOSTOMY

**The ileostomy:** The entire colon, rectum, and anus are removed or by-passed. The small intestine (ileum) is brought through the abdominal wall, creating an external stoma.

- The most common conditions necessitating an ileostomy are **Chron's disease, ulcerative colitis, cancer or trauma**.
- The output from the ileostomy (stool) can range from watery to pasty and requires that a collection pouch be worn at all times.
- Diarrhea may be a frequent problem and can lead to dehydration. It is important to drink plenty of fluids to remain well hydrated.

## CONTINENT URINARY RESERVOIR (CVR)

- An **internal reservoir** with a nipple valve is constructed from a section of small intestine and the valve is brought through the abdominal wall to create a stoma for intubation to empty the reservoir/pouch.
- A **pelvic pouch/reservoir** is constructed from small intestine, which is brought down and attached to the anus. Evacuation is through the anus.

## UROSTOMY

**Urostomy:** The bladder is removed or by-passed. A **conduit** is constructed from a segment of small intestine into which ureters are implanted and brought through the abdominal wall and an external stoma is created. The output will be urine.

- Situations necessitating a urostomy are birth defects, cancer, trauma or spinal cord injuries.
- The intestine normally produces mucous, which will be present in the urine, giving it a cloudy appearance. This does not necessarily indicate a urinary tract infection.
- Adequate fluid intake is important (8-10 glasses of water a day, or 2000cc). It's also important to keep the urine acidic: one 500mg tablet of vitamin C taken every day will help.

## CONTINENT URINARY RESERVOIR

• **Continent Urinary Reservoir:** The bladder is removed or by-passed. An **internal reservoir** is constructed from a segment of the small or large intestine into which the ureters are implanted and a stoma is created for intubation to empty the reservoir/pouch.

## PEDEIC POUCHES

- Ostomy surgery in infants and children is generally due to birth defects or trauma.
- In a newborn, crying may cause a **hernia or prolapsed stoma**.
- There are pediatric pouches available for ostomy management with infants and children.
- Some **adults** also use these pouching systems because of their small size.

## YOUR CHOICES

There may be some emotional distress associated with having an ostomy.

- Most communities have UOA chapters that offer support through a patient visiting program, newsletters, and regular meetings. Also some hospitals have support groups that meet on a regular basis.
- There are also **web sites** where you can "chat" live on line with other ostomates as well as access the different ostomy associations.
- Never hesitate to call your doctor or ET nurse for advice. They are a valuable resource that is often overlooked.

## DIET

After healing is complete and the ostomy is functioning normally, most people with ostomies can return to a normal diet. The following are some dietary suggestions for controlling your output:

**Diet:** It is not necessary

to make a life altering change when it comes to diet, but the following are some dietary suggestions for controlling your output.

- Avoid gas-producing foods such as **broccoli, cabbage or beans**. Too much gas will inflate the pouch with air, which could force it to "pop" off.
- Foods such as nuts and whole kernel corn, **foods high in fiber and mushrooms** can cause potential blockage or constipation.
- **Asparagus, eggs, fish, garlic, onions and beans** are among the foods that may cause odors.
- Some bulk-causing foods are **Chinese food, popcorn, whole grains and vegetables**.
- **Fresh fruit, raw vegetables, spinach and highly seasoned foods** may cause diarrhea.



**POUCHING SYSTEMS continued:**

**Two piece system:**

- This type of pouching system is made of the same materials, but the pouch is snapped onto the wafer (similar to a lid on a plastic container).
- The pouch can be removed to clean and then it may be reattached. The normal wear time for a wafer is 3-5 days.
- The pouches can be **drainable** or **closed**. The drainable pouch is cleaned on the body and reused while the closed pouch is discarded when full. (A zipper type sandwich bag can be used when disposing of the bag to seal it and control odor).
- Drainable pouches come with a pouch clamp to secure the bottom. It's best to roll the clamp on the pouch a couple of times before fastening it.
- There are closed **mini pouches** available for ostomates who irrigate and have little output or occasions when a large pouch is not necessary.



**Urostomy**

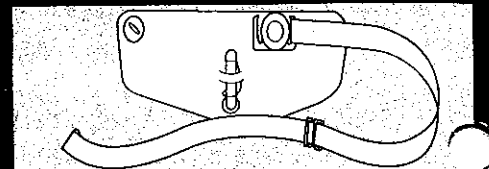
**Pouches (urine):**

- The pouches are drainable, with a spigot-like drain on the bottom.
- They are easily drained into a receptacle and reclosed.
- At night, these pouches can be connected to a 2000cc drainage system, found at your local home healthcare supply store.
- This helps to avoid leakage and the need to get up numerous times during the night to drain the pouch.



**Do not use any creams with petroleum or talcum powder around the peristomal skin. May prevent pouch adherence.**

**POUCHING SYSTEMS continued:**



**Other options:**

- **One-piece systems** featuring a belt that is worn around the waist, with a nonadhesive silicone ring, are available for most types of ostomies. This type of system is recommended for people that have allergies or sensitivity to the adhesive or tape.
- Some **wafers** come with the opening (hole) already cut to size. Others need to be cut using scissors or a **hole cutter**. A hole cutter looks like a cookie cutter and produces a smooth, clean cut. Opening should be 1/8" larger than stoma.
- **Support belts** are available for pouching systems; they are usually 1.5" wide and are an added security. Wider belts are also available, ranging from 3-12", and have a Velcro closure. You will need to be fitted for this belt, which is available as a special order at health care supply stores.
- **Double Barrel Stoma:** In some cases, people can have more than one stoma, and need to have pouching systems that will not overlap.
- The **second stoma** (a mucous fistula) may only expel mucus, and a stoma cap or gauze pad may be sufficient.
- Your home health care nurse, enterostomal therapist or medical supply store can help you decide which pouching system is best for your needs.

**wafer**



**mini pouch**

**double barrel stoma**



**stoma cap**

- Skin care:** Keeping the skin healthy around the stoma is extremely important.
- When changing your pouching system, always **examine** the skin, making sure it is clean and dry.
  - A hair dryer on low heat can speed drying time.
  - Just be sure to keep a piece of tissue or gauze on the stoma to absorb leakage during pouch change.
  - There are **creams, gels, cohesive seals, and protective film products** available to keep the skin healthy.
  - In the case of **red or broken skin**, consult your health care professional for advice on a product to heal the area.

**GENERAL INFORMATION**

- There are many different **pouching systems** on the market today.
- These include one-piece, two piece, flat, convex, drainable and closed pouches.
  - The location and construction of the stoma will determine the wear time of the pouching system.
  - You may also need to shop around until you find the system that is best for you.
  - Some manufacturers will send you a sample of their system.
  - Pouches are available in clear or opaque.

**COLONOSTOMY IRRIGATION**

- Irrigation:** A colostomy irrigation is comparable to an enema but is administered through the stoma (usually 1x per day).
- Usually it is only necessary to wear a stoma cap, gauze pad or small pouch to collect any leakage. A person with a colostomy located in the descending or sigmoid colon is best suited for irrigation.
  - Consult your doctor to see if irrigation is best for you.

**Irrigation is not recommended for persons with a herniated stoma, prolapsed stoma or for young children and infants**

**ADHESIVE SYSTEMS**

- The opening of the wafer (adhesive barrier) should fit snugly around the stoma, with approximately 1/8" of skin showing.
- This allows for the stoma to expand when passing stool or urine, increasing the wear time of the pouching system and preventing skin irritation from leakage.



**One piece system:**

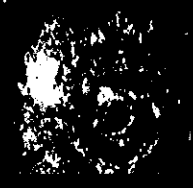
- This type of system consists of a "wafer" (the adhesive barrier) with a pouch attached. The average wear time is 3-5 days.
- The pouch can be cleaned without removing it from the body.
- Using a 60 cc syringe or turkey baster, carefully squirt warm water into the pouch. Be sure not to get the wafer part of the pouching system wet. This will shorten wear time.

COMMON SKIN PROBLEMS continued:

Epidermal Hyperplasia:

•Symptoms: Thick, wart-like skin around the stoma. The opening in the skin barrier is most likely too large, exposing too much skin.

•Treatment: Reduce the opening size to 1/8" larger than the stoma. Consult your physician for treatment of skin.



COMMON PROBLEMS AND SUGGESTIONS continued:

• The pouch sticks to the skin: Try using a pouch cover. They are made of cotton material and slip on and off easily. They will also help cut down on the noise a plastic pouch may make.

• The skin under the wafer is itchy: When changing the pouching system, try a little calamine lotion or stoma powder on the skin first. Dab on with your finger or a cotton ball, let dry and brush away any powdery residue, then attach the wafer. There is a possibility that you may be allergic to the wafer material. You may want to change the type or brand of your pouching system. Increasing water intake can sometimes relieve itching.



• There is a scar next to the stoma: Try using stoma pastes, cohesive seals or adhesive rings to fill in any scars, skin valleys or crevasses. This creates a smoother surface, preventing leakage and allowing for longer wear time.

Odor control: Check with your doctor if you are taking medications. Some medicines will cause unusual odor. Foods such as fish, eggs, cheese and garlic are odor-producing, (see Diet).

• Most pouches are made of plastics with odor control barriers.

• There are drops and tablets you can put in the pouch, as well as charcoal filters that adhere to the outside of the pouch.

• When the filter is attached, poke a few pin holes through it, or make an X with scissors prior to applying the filter, being very careful only to cut the outside of the plastic. There are also pouches with built-in filters.

• Some people put mouthwash, peppermint or vanilla extracts into the pouch.

• Also try drinking orange or cranberry juice, or eating parsley or yogurt for odor control.

• Keep a purse size container of room deodorizer in case you have to empty your pouch away from home.

When charcoal in a filter gets wet, it no longer controls odor.

There are different types, shapes and sizes of stomas.

• The ideal stoma is a round button-shaped circle which protrudes about 1/2". Some stomas may be flush with the skin, or even inverted.



In this case there are wafers with built in convexity, and convex rings that come in different opening sizes that can be snapped into the existing wafer (they must be the same brand to fit properly). This helps to push the skin in and force the stoma out.

• You may also use stoma paste or cohesive seal rings (caulking) around the stoma to help prevent leakage.



• Prolapsed stoma:

A prolapse is a telescoping of the intestine out through the stoma. This happens when there is:

- an excessively large opening in the abdominal wall.
- inadequate suturing of the bowel to the abdominal wall.
- increased pressure associated with tumors.

Candida Infection:

Candida albicans is a form of yeast.

• Symptoms are itching and redness found around the stoma and can spread to the groin area.

• Treatment: Apply corticosteroid spray, (cortisone) and an anti-fungal powder. Be sure to dust away excess residue. Consult physician if symptoms continue.

Urine crystal formation;

• Symptoms:

White, gritty deposits on or around the stoma. This is caused by the high alkaline level in the urine.

• Treatment: Use a solution of water and vinegar to dissolve the crystals on the skin. Increase fluid intake to 2.5 quarts a day. Consult a physician if symptoms continue.

COMMON PROBLEMS AND SUGGESTIONS

• The pouch frequently pulls away: Be sure to empty the pouch frequently, when about 1/3 full, as too much weight in the pouch will pull it down. Also, if the pouch fills with gas or air, this can cause the pouch to pull away (see diet and odor control).

• The stoma bleeds a little: This is normal. The blood capillaries are close to the surface of the tissue. If there is excessive bleeding, consult your doctor.

• The wafer won't stick: Be sure the skin is dry and clean. Perspiration can inhibit adhesion. Additional skin adhesives may be necessary and are available where you buy your supplies. Pastes and powders will aid in wear time, as will protective film barriers that seal in moisture. Picture-framing the outside of the wafer with a medical tape (preferably waterproof) will prevent the wafer from rolling on the edges. Try making the wafer tackier by warming the back of it with a hairdryer before applying.

• The skin is red from leakage: Dab a cotton ball moistened with a little liquid antacid on the skin. Let dry and attach the pouching system. The antacid will neutralize the acidic properties in the urine or feces. There are several types of skin barriers that will protect the skin from fecal output and urine output. They include karaya based, pectin and synthetic based barriers. Also liquid skin protectors provide a plasticizing film over the skin that protects the skin from moisture and from tape damage.

Also, stoma powder will help protect the skin. There are wipes available that will soothe the skin.

Be sure the wafer is snug against the stoma.

If too much skin is exposed around the stoma, reduce the size of the opening (no more than 1/8" larger than the stoma).

## COMMON PROBLEMS AND SUGGESTIONS continued:

- **How to clean the pouch:** Rinse pouch with tepid water after emptying. Avoid splashing water up and around the base of the opening to help prevent undermining the seal. There are also detergents on the market that work very well.
- **Can I go swimming?** Yes! Colostomates who irrigate may find it necessary to only wear a stoma cap or small closed-end pouch. Others who have no control (ileostomates and urostomates) and wear a drainable pouch should empty prior to swimming. Picture-framing the wafer on the outer edges with a waterproof tape will help support the pouch and prevent water from undermining the seal. A smaller "mini-pouch" may be more desirable and less noticeable.

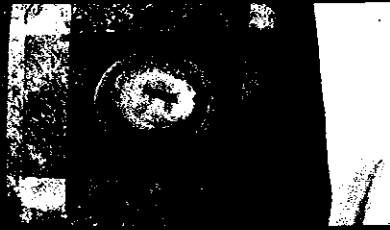
**Herniated stoma:** A hernia may occur after ostomy surgery due to a weakness in the abdominal wall.

- **Support belts** are available in widths ranging from 3-12" that will push in the hernia and also help keep the pouching system in place.
- Some hernias may have to be corrected surgically.
- **Should I shower with my pouching system on?:** It's up to the individual. To let the area get wet and clean, it is best to shower in between changing your pouching system. This also gives the skin an opportunity to breathe. A shower can be soothing to the area, but be sure the skin is completely dry and cool from the heat of the shower before you put on the new pouch. If you choose to leave the pouch on, you may want to picture-frame (tape all four outside edges) the wafer with a waterproof tape.
- **Storage of supplies:** Try to store them in a cool, dry place. Always replace caps on tubes of paste to keep from drying out. If you open a wafer and don't use it immediately, seal it in a sandwich bag. If necessary, keep a small cooler with an ice pack to store your supplies during summer car trips.
- **Stool won't fall to the bottom of the pouch:** Try putting a little vegetable oil (spray vegetable oil is easiest) or baby oil inside the pouch to lubricate the plastic before attaching it to the body. Be sure not to get it on your skin or the wafer. Or mix oil with rinse water the first time after emptying.

### DISCLAIMER:

Always consult your doctor or therapist with any concerns or problems with your ostomy. This chart is intended only for informational purposes and helpful hints. This chart is not a substitute for professional medical care. Neither BarCharts, nor its writers & proofers, are in any way responsible or liable for the use or misuse of the information contained in this chart.

## COMMON PROBLEMS AND SUGGESTIONS continued:



- **My wafer looks like it's "turtle necking":** Extended wear wafers are designed to turtle neck around the stoma after a day or two (see illustration), which helps prevent leakage and extends wear time.
- **My pouch fills with air:** A self-adhering charcoal filter can be attached to the outside of the pouch. After you apply the filter, poke pin holes through the pouch, pin holes can be poked through the pouch, or a small "X" may be carefully cut with scissors prior to applying the filter. This will allow air to be released while controlling odor. Be sure to put the filter high on the pouch (above and to the side of the stoma), and cut only the front side of the pouch. **Do not** cut through to the backside of the pouch. *If the filter gets wet, it is no longer effective for odor control!*

## HELPFUL HINTS

- Make sure the skin around the stoma has no skin folds or wrinkles when applying the pouch. These wrinkles may cause the seal to break when you straighten up or lie down.
- Keep a little air in your pouch so that there is not a vacuum effect of the pouch onto the stoma.
- Wear your pouch inside your underwear for support.
- Do not "rip" the pouch away from the abdomen or remove it too frequently. Remove it gently by pushing your skin from the pouch rather than pulling the pouch from the skin. Water will often help.
- Clean pouches with cold or tepid water to decrease absorption of odor and discoloration into the plastic of pouches.
- Store pouches away from warm, humid places. "Meltout" can render equipment ineffective. Insulated lunch bags are good for storage of emergency supplies for car or office.
- Remeasure your stoma to ensure the correct size of pouch and skin barrier opening.
- If you cut your own center holes, save the leftover pieces and use them to fill in any skin indentations around the stoma underneath the wafer.

## HELPFUL HINTS continued:

- Do not use "baby wipes" to clean the skin around the stoma. Most contain lanolin that leaves a residue on the skin that interferes with adhesion of the pouch.
- Spot bleeding often occurs during cleaning and pouch changing. This is common to all ostomates. Prolonged bleeding, increased amounts of bleeding, or very easy bleeding may indicate another problem and should be reported to your doctor.
- Always carry an extra pouch and wafer with you for any emergencies.
- Discard used pouches in a zipper type sandwich bag.
- Keep a list of your ostomy products, complete with order numbers, sizes and manufacturers. Let a member of your family know where you keep the list so that they can get the necessary supplies in the event of an emergency.

## RESOURCES

- **American Cancer Society**  
1-800-ACS-2345 and/or [www.cancer.org](http://www.cancer.org)
  - **Crohn's and Colitis Foundation of America**  
1-800-343-3637 and/or [www.cdfa.org](http://www.cdfa.org)
  - **United Ostomy Association, Inc.**  
1-800-826-0826 and/or [www.uoa.org](http://www.uoa.org)
  - **Wound, Ostomy and Continence Nurses Society**  
1-888-224-9626 and/or [www.wocn.org](http://www.wocn.org)
  - **National Manufacturers/Professional Services Department**
- Other Agencies:**  
Visiting Nurse Association (VNA)  
Public Health Nurses  
Medicare (federal)  
Medicaid (state)  
Social Security disability benefits

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