

# PROCEDURE EDUCATION LITERATURE

We recommend that you read this handout carefully in order to prepare yourself or family members for the proposed procedure. In doing so, you will benefit both the outcome and safety of the procedure. If you still have any questions or concerns, we strongly encourage you to contact our office prior to your procedure so that we may clarify any pertinent issues. "An educated patient is the best patient."

# DILATION AND CURETTAGE/HYSTEROSCOPY

### Definition

Dilation - the act of stretching the cervical (the neck of the womb) opening to the cavity of the uterus (womb)

Curettage = scraping the lining of the uterus (endometrium) for removal of (normal and/or abnormal) tissue, often for diagnostic evaluation Hystero = of or denoting the womb (uterus)

Scopy - examination with an instrument for improved viewing, often with magnification and directed lighting

Dilation and curettage (D&C) is an outpatient procedure during which your doctor will enlarge the opening to the uterus (womb) so that a surgical instrument, called a curette, can be inserted to scrape out the lining of the uterus. Hysteroscopy is the direct visualization of the uterine cavity with lighting and magnification through a long, pencil-sized "telescope" inserted in the cavity of the uterus. D&C, with or without a hysteroscopy, can be performed for a variety of symptoms, such as abnormal uterine bleeding, postmenopausal bleeding, and irregularity in ultrasound or x-ray of the uterus. Often this is done to aid in the diagnosis of infertility or when cancer of the uterine lining is suspected.

The menstrual cycle is designed to prepare a healthy endometrial lining for a fertilized egg to grow in. Once a month, if a woman does not become pregnant, the "old" lining is shed through the cervical canal with the menstrual period and replaced with "new" lining in preparation for pregnancy. This cycle is repeated throughout a woman's lifetime until her ovaries no longer make enough of the hormones needed to continue a regular, monthly cycle. Alterations in this cycle and irregularities of the lining of the uterus can lead to episodes of vaginal bleeding that are unpredictable, heavy, or cause significant discomfort.

For women in their teens, 20s, and 30s, irregular bleeding is most often the result of either pregnancy or an egg not being released during their menstrual cycles (anovulation). As women enter their 40s and 50s, ovulation becomes less regular and may lead to abnormal patterns of uterine bleeding. Another cause of bleeding in women in their 40s and 50s is thickening of the uterine lining. In the woman who has stopped menstruating, or reached menopause, a common cause for uterine bleeding is hormone therapy.

Irregular uterine bleeding and bleeding during menopause are often signs of uterine cancer. Because uterine cancer is more common in older women than in younger women, it is important that the cause of bleeding is investigated and treated. Cancers of the uterus, when discovered early in their development, can be cured.

Abnormalities in the shape of the uterine cavity can lead to a variety of symptoms including abnormal bleeding, repetitive pregnancy loss, inability to conceive, and others. Abnormal separations (septations), fibroid tumors (benign tumors), endometrial polyps, and scarring are only some of the causes of abnormalities in the shape of the uterine cavity.

There are a variety of procedures to collect endometrial tissue from the lining of the uterus. Some are designed to be performed in your doctor's office (endometrial biopsy) with very little advance preparation or discomfort. Dilation and curettage (D&C) is a procedure that removes a larger sample of the uterine lining and is typically performed in an outpatient hospital setting or surgery center. Dilation and curettage, when combined with hysteroscopy, allows your doctor to see most abnormalities present, and many times, an opportunity to correct them. The type of procedure recommended will depend on your symptoms, age, results of other testing, and the preference of your doctor. The pros and cons of each will have already been discussed with you in your consultation.

#### Preparation

No special preparation is necessary for most patients. However, for some it is necessary to begin the process of opening the cervix the day before the procedure. There are different methods of preparing the cervix, including the placement of dried sponge-like material in the opening and placement of medicines in the vagina near the cervix. This preparation will be started in the office if you doctor feels it is necessary to include it in your care. Your doctor will tell you which medicines you may take for discomfort.



If you have been having heavy bleeding, your doctor might ask for a blood test to check for anemia (low blood count). A pregnancy test is usually performed for women who might be pregnant.

The D&C can be performed with anesthesia (pain management and sedation) given locally (injected around the cervix), regionally (delivered around the nerve supply to the pelvis), or generally (medicine given in the veins to control pain and make you sleep). Your gynecologist and anesthesiologist will make a recommendation for anesthesia based on your condition, the goals of the D&C/hysteroscopy, and if any other procedures will be performed at the same time.

As with most procedures in which regional or general anesthesia is administered, you will be instructed not to eat or drink anything after a certain time, usually midnight, on the evening prior to your surgery. You may brush your teeth in the morning but should not swallow the water. If you are on medications that must be taken, you will have discussed this with us and/or the anesthesiologist and instructions will have been given to you. The procedure might not be performed if you are currently taking, or have recently taken any medication that may interfere with your ability to clot your blood ("blood thinners, aspirin, anti-inflammatory medicines, etc..."). The most common of these medications are aspirin and all related pain relievers or anti-inflammatory compounds (whether prescription or over-the-counter). Please refer to the attached list and tell us if you took any of these within the past 10 days. If your new medication is not on the list, alert us immediately so that we may ensure optimal procedure safety. We will have reviewed all of your current medications with you during the pre-operative/pre-procedure consultation. You are obligated to inform us if anything has changed (medication or otherwise) since your previous visit.

### Procedure

You will be lying on your back with your legs elevated in stirrups, much like you would for a pelvic examination. The procedure usually takes between 30 minutes and one hour depending on the type of anesthesia used and if other procedures are to be performed at the same time.

The procedure begins by gently cleaning the vagina and placing a speculum in the vagina to hold it open. The cervix is grasped with an instrument to hold it still, while the opening is gradually dilated with surgical instruments until the hysteroscope or curette can be inserted without force.

The cavity of the uterus is much like a balloon: when empty it is flat but when inflated, space is created inside the balloon where there was none. Performing hysteroscopy involves "inflating" the cavity of the uterus with a liquid or gas (flowing in and out through the "telescope") so that each surface can be seen. Miniaturized instruments can then be placed along with the telescope to correct many of the abnormalities of the shape of the cavity.

After hysteroscopy is completed, the lining is scraped out through the opening and collected for microscopic examination in the laboratory by a pathologist. Hysteroscopy may or may not be repeated following curetting the lining of the cavity.

#### Post Procedure

You will be in the recovery room for a short time before being sent home from the outpatient surgery center. Though you may have some discomfort and cramping following the procedure, it is not necessary for you to plan time off from work or your normal activities beyond the day of surgery. It is normal to have some bleeding and discharge following D&C/hysteroscopy. It is suggested that you use menstrual pads to maintain hygiene and protect your clothing. You are instructed to refrain from vaginal intercourse, douching, and tampon use until told you may resume by your doctor.

Medications, such as ibuprofen or naproxen, are usually all that is needed for the cramping you might have after your surgery. Ask your doctor what is recommended or if a prescription for pain medicine will be given. An antibiotic prescription may also be given and should be taken until completion. If any side effects occur, contact our office immediately.

## **Expectations of Outcome**

Your doctor will explain what information was found following your surgery. The results of the microscopic examination of the specimens collected will take up to a week to become available from the laboratory. Once this information is available, your doctor will make recommendations for further treatment based on the specific results of your testing.

Many women who have experienced heavy or irregular uterine bleeding will return to a regular menstrual cycle following D&C. Maintenance of regular cycles may be assisted with hormone or birth control pills.

If your surgery was part of an investigation into infertility, your doctor will explain what was found and accomplished by the surgery and will help you understand the impact of these findings on your future fertility.

### Possible Complications of the Procedure

All surgical procedures, regardless of complexity or time, can be associated with unforeseen problems. They may be immediate or even quite delayed in presentation. While we have discussed these and possibly others in your consultation, we would like you to have a list so that you may ask questions if you are still concerned. Aside from anesthesia complications, it is important that every patient be made aware of all possible outcomes, which may include, but are not limited to:



- <u>Perforation of the Uterus:</u> The most serious complication of the procedure is the creation of a perforation, or hole, in the wall of the
  uterus. Perforation of the uterus may lead to injury of other structures and organs within the abdomen (blood vessels, nerves, intestines,
  and bladder), bleeding, or infection. Perforation is not common, however, may require another operation to be treated appropriately.
- Infection: D&C/hysteroscopy involves placing an instrument through the vagina and cervix into the uterus. Because of this, it is possible to
  introduce a microorganism (such as bacteria or yeast) from the vagina into the uterine cavity. Many microorganisms are normally present
  in the vagina and cause no infection or other symptoms. However, when these same microorganisms are present within the cavity of the
  uterus, a more serious infection can be the result. Signs of infection that you should be watchful of are: foul-smelling vaginal discharge,
  tenderness, or pain in the vagina and pelvis for more than two days, bleeding lasting more than two days, fevers, shaking chills, nausea,
  vomiting, weakness, and feeling ill. \*If you have symptoms suggesting any of the above after your discharge from the hospital, you must
  contact us immediately or go to the nearest emergency room.
- <u>Bleeding:</u> Most women will have a small amount of bleeding following this procedure. If your bleeding is heavier than your normal period, or lasts longer than two days, please call your doctor.
- Fluid Imbalance: In addition to water, fluids used to "inflate" the cavity of the uterus for hysteroscopy contain dissolved sugars, starches, and salts. These substances give the fluids certain desirable properties for visualization of the uterine cavity. When too much fluid flows from the uterus and enters the abdominal cavity or blood stream, an "imbalance" in the water content of the blood may result. Careful choice of fluid and monitoring of fluid delivery make this an uncommon complication.
- Deep Vein Thrombosis (DVT)/Pulmonary Embolus (PE): In any operation (especially longer operations), you can develop a clot in a vein
  of your leg (DVT). Typically, this two to seven days (or longer) after the procedure as pain, swelling, and tendemess to touch in the lower
  leg (calf). Your ankle and foot can become swollen. If you notice these signs, you should go directly to an emergency room and also
  call our office Although less likely, this blood clot can move through the veins and block off part of the lung (PE). This would present as
  shortness of breath and possibly chest pain. We may sometimes ask the medical doctors to be involved with the management of either of
  these problems.
- Lower Extremity Weakness/Numbness: This, too, is a rare event that may arise due to your position on the operating table. It is possible in
  procedures in which you are in the lithotomy (legs up in the air) for a long period. The problem is usually self-limited, with a return to
  baseline expected.

Patient	Date
Physician	Date
Witness	Date

The information contained in this Medical Informed Consent Form ("Consent Form") is intended to solely inform and educate and should not be used as a substitute for medical evaluation, advice, diagnosis or treatment by a physician or other healthcare professional. Please call your doctor if you have any questions.