

## **Long-Acting Reversible Contraception**

## **Intrauterine Device and Implant**

The *intrauterine device (IUD)* and the *birth control implant* are long-acting reversible contraception (LARC) methods. Both are highly effective in preventing pregnancy. They last for several years and are easy to use. Both are reversible—if you want to get pregnant or if you want to stop using them, you can have them removed at any time.

LARC methods are a safe and effective birth control choice for women of all ages. Teenagers, women who have given birth, and women who have never given birth can use these methods. They also are good methods for women to use immediately after having a baby.

This pamphlet explains

- · effectiveness of LARC methods
- benefits, possible side effects, and risks of the IUD
- · benefits, possible side effects, and risks of the implant

# Effectiveness of LARC Methods

The IUD and the implant are the most effective forms of reversible birth control available. During the first year of use, fewer than 1 in 100 women using an IUD or implant will get pregnant. Over time, LARC methods are 20 times more effective than birth control pills, the patch, or the ring.

The IUD and the implant do not protect against sexually transmitted infections (STIs), including human immunodeficiency virus (HIV). A male or female condom also should be used to provide STI protection if you are at risk of getting an STI. You are at risk of getting an STI if you

- have more than one sexual partner
- have a partner who has or has had more than one sexual partner
- · have sex with someone who has an STI
- have a history of STIs
- use intravenous drugs (injected into a vein) or have a partner who uses intravenous drugs

#### **Intrauterine Device**

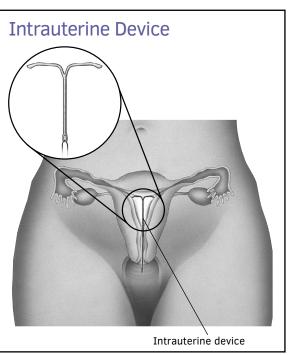
The IUD is a small, T-shaped, plastic device that is inserted into and left inside the *uterus*. There are two types of IUDs:

- 1. The hormonal IUD releases the hormone *progestin* into the uterus. There are different brands of hormonal IUDs that last for different lengths of time. Depending on the brand, they are approved for up to 3 to 7 years of use.
- 2. The copper IUD releases copper into the uterus. This IUD does not contain hormones. It is approved for up to 10 years of use.

#### **How It Works**

The IUD works mainly by preventing *fertilization* of an *egg* by *sperm*. The progestin in the hormonal IUD thickens mucus found in the *cervix*. Thicker mucus makes it harder for sperm to enter the uterus and reach an egg. Progestin also thins the lining of the uterus.

The copper in the copper IUD interferes with sperm's ability to move. When sperm stop acting normally, it is harder for them to enter the uterus and reach an egg.



## Warning Signs

The following signs and symptoms may signal a problem with your IUD. A health care professional should remove the IUD. Call your health care professional if you have any of the following:

- Severe pelvic pain
- Unexplained fever
- Unusual vaginal discharge
- Feeling the IUD in the cervix or vagina
- Signs of pregnancy: positive home pregnancy test, missed menstrual period, or other signs of pregnancy in addition to a missed period, such as nausea or breast tenderness

#### **Benefits**

The IUD has the following benefits:

- It is easy to use. Once it is in place, you do not have to do anything else to prevent pregnancy. It is effective for years.
- No one can tell that you are using birth control.
- It does not interfere with sex or daily activities. You can use a tampon with it.
- It can be inserted immediately after an abortion, a *miscarriage*, or childbirth. It can be used while breastfeeding.
- Almost all women are able to use an IUD.
   There are few medical problems that prevent its use.
- If you want to get pregnant or if you want to stop using it, you can have the IUD removed. You can start trying to get pregnant right after removal. Using an IUD does not affect your ability to get pregnant in the future.
- Over time, the hormonal IUDs help decrease menstrual pain and heavy menstrual bleeding.
- The copper IUD also is the most effective form of *emergency contraception (EC)*.
   When used for EC, it should be placed in the uterus within 5 days (120 hours) of having unprotected sex. Then you can leave it in and use it as a regular form of birth control.

#### How the IUD Is Placed

An *obstetrician—gynecologist (ob-gyn)* or other health care professional must place and remove an IUD. Together you should discuss your medical history, and you should have a *pelvic exam*.

The IUD can be placed at any time during your *menstrual cycle* as long as it is reasonably certain that you are not pregnant and you do not have signs of an infection. You may have a pregnancy test before the IUD is placed. If you are at risk of STIs, you may need STI tests either before placement or on the day of insertion.

The IUD is inserted after the pelvic exam. The IUD is guided through the *vagina* and the cervix and then into the uterus. Placement of the IUD may cause some temporary discomfort. Taking over-the-counter pain relief medication such as ibuprofen before or after placement may help.

The IUD has strings made of thin plastic threads. Your health care professional will use the strings to remove the IUD later. After placement, the strings are trimmed so that they extend just past the cervix into your vagina.

The strings should not bother you, but in rare cases your sexual partner may feel them during sex. If this happens and it is a concern, your health care professional may be able to trim the strings shorter.

If you have a hormonal IUD inserted more than 7 days after the start of your menstrual period, you should avoid intercourse or use a backup method, such as a condom, for the next 7 days. If it is fewer than 7 days since the start of your menstrual period, you do not need to use a backup method. The copper IUD protects against pregnancy right away and you do not have to use a backup method or avoid intercourse.

#### **How the IUD Is Removed**

When you are ready to stop using the IUD, your health care professional will remove it during a pelvic exam. The strings are grasped with an instrument and used to gently pull out the IUD. IUD removal usually takes less time than IUD placement.

#### **Possible Side Effects**

When a woman uses an IUD, changes in menstrual bleeding are normal and not harmful. Some changes can be temporary and may go away as your body gets used to the IUD. Others may last for as long as you have the IUD.

If you have changes in bleeding that concern you, talk with your health care professional. Often, medications can help with some of the bleeding changes that happen with IUDs.

With the copper IUD, painful periods and bleeding may increase during the first months of use. Over-the-counter pain relievers may be used for pain and bleeding. Hormonal IUDs may cause frequent spotting, more days of bleeding, and heavier bleeding in the first months of use. Over time, the amount of menstrual bleeding and the length of your menstrual period usually decrease. Menstrual pain also usually decreases. For some women using a hormonal IUD, menstrual bleeding stops completely.

Some women also may experience other side effects, including

- headaches
- nausea
- breast tenderness
- mood changes

#### **Possible Risks**

Serious complications from IUDs are rare. But some women do have problems. Be alert for symptoms that may signal a problem with your IUD (read the box "Warning Signs"). These problems usually happen during or soon after insertion:

- In a small number of women, the IUD may come out of the uterus. The entire IUD may come out, or only part of it may come out. The risk is higher in teenagers, women with heavy menstrual bleeding, and women who have an IUD inserted immediately after childbirth. If the IUD comes out, it is no longer effective. You may be able to have a new IUD inserted.
- The IUD can go through the wall of the uterus during insertion. This usually does not cause any major health problems, but the IUD will need to be removed. This is rare and happens in only about 1 out of every 1,000 placements.
- Pelvic inflammatory disease (PID) after IUD insertion happens very rarely. Using an IUD does not by itself increase the risk of PID. Women with an undiagnosed STI at the time of IUD insertion are more likely to develop PID than women without an STI. If you are at risk of STIs, you may be screened before you get an IUD.
- Rarely, pregnancy may occur while a
  woman is using an IUD. If pregnancy
  occurs and you want to continue the
  pregnancy, the IUD should be removed if
  your health care professional can see the
  IUD in the cervix or if the strings are
  visible. If the IUD remains in place
  during pregnancy, there are increased
  risks of miscarriage and infection.
- In the rare case that a pregnancy occurs with the IUD in place, there is a higher chance that it will be an *ectopic pregnancy*. This is a serious condition that needs medical attention right away.

## The Birth Control Implant

The birth control implant is a flexible, plastic rod about the size of a matchstick that is inserted just under the skin in the upper arm. It releases progestin into the body. The implant is approved for up to 3 years of use.

#### **How It Works**

The progestin in the implant prevents pregnancy mainly by stopping *ovulation*. The progestin in the implant also thickens the mucus of the cervix, which makes it harder for sperm to enter the uterus and reach the egg. Progestin also thins the lining of the uterus.

#### **Benefits**

The implant has the following benefits:

- It is easy to use. Once it is in place, you
  do not have to do anything else to
  prevent pregnancy. It is effective for a
  long time.
- No one can tell that you are using birth control. The implant cannot be seen under the skin (but it can be felt).
- It can be inserted immediately after an abortion, a miscarriage, or childbirth.
   It can be used while breastfeeding.
- It does not interfere with sex or daily activities.
- Almost all women are able to use the implant. There are few medical conditions that prevent its use.
- It reduces pain during your menstrual period.
- If you want to get pregnant or if you want to stop using it, you can simply have the implant removed. You can start trying to get pregnant right after the implant is removed.

#### How the Implant Is Inserted

The implant can be inserted at any time during your menstrual cycle as long as it is reasonably certain that you are not pregnant. A health care professional will insert the implant into your arm. A small area on the inside of your upper arm may be numbed with a local pain medicine. The implant is placed under the skin with a special inserter. There is no incision. The procedure takes only a few minutes.

You may have some mild bruising after the implant is inserted. Applying sterile gauze with a pressure bandage for 24 hours may reduce bruising.

If you have an implant inserted more than 5 days after the start of your menstrual period, you should avoid intercourse or use a backup method, such as a condom, for the next 7 days. The implant protects against pregnancy right away if it is placed within 5 days of the start of your menstrual period.

#### **How the Implant Is Removed**

When you are ready to stop using the implant, a health care professional must remove it. A small area on your upper arm is numbed with a local *anesthetic*. One small incision is made. The implant is removed through the small incision. The procedure usually takes only a few minutes.

#### **Possible Side Effects**

Like IUDs, the implant can cause changes in menstrual bleeding. The most common change is unpredictable bleeding.

Menstrual periods may be less frequent and may stop completely. But in some women, periods are more frequent and last longer. Other side effects may include

- digestive difficulties
- headaches
- · breast pain
- weight gain
- acne

#### **Possible Risks**

Possible risks with use of the implant include the following:

- Problems with insertion or removal of the implant. These problems are rare.
- Although rare, if a woman gets pregnant while the implant is inserted, there is a slightly increased risk of ectopic pregnancy. The implant should be removed if pregnancy occurs.

## Finally...

The IUD and the birth control implant are the most effective forms of reversible birth control. They are convenient, easy to use, and long-lasting. These methods can be used by teenagers, women who have given birth, and women who have never given birth.

Some methods have benefits in addition to preventing pregnancy, such as decreased menstrual pain and bleeding. If you are interested in one of these methods, talk with your health care professional about which method is best for your needs and lifestyle.

## Birth Control After Pregnancy

It is possible to get pregnant very soon after having a baby if you are not using a birth control method. The first year after having a baby is called the *postpartum* period. At least 7 in 10 pregnancies during the postpartum period are unintended. Some women can get pregnant even before their menstrual periods return.

Using the birth control implant or IUD immediately after you have a baby can help you avoid an unintended pregnancy and lets you control if or when you want to get pregnant again. To help prepare for the postpartum period, talk with your health care professional before delivery about what birth control method you will use after the baby is born.

The implant can be inserted in the delivery room or at any time before you leave the hospital. The implant is safe to use while breastfeeding.

The IUD can be inserted in the uterus right after a vaginal or *cesarean birth*. It also can be inserted at any time before you leave the hospital, but it is more convenient to have it done within 10 minutes of delivery. The IUD also is safe to use while breastfeeding.

Most women can safely have an IUD inserted after delivering a baby, but some women should not, including those with *postpartum hemorrhage* or signs of infection. The risk of the IUD coming out is higher when it is inserted immediately after childbirth.

If the IUD comes out, it is no longer effective. You should use another form of birth control until you can see your health care professional. You may be able to have a new IUD inserted. You also should be aware of the signs of a problem with your IUD (read the box "Warning Signs").

## **Glossary**

Anesthetic: A drug used to relieve pain. Birth Control Implant: A small, single rod that is inserted under the skin in the upper arm. The implant releases a hormone to prevent pregnancy.

*Cervix:* The lower, narrow end of the uterus at the top of the vagina.

*Cesarean Birth:* Birth of a fetus from the uterus through an incision (cut) made in the woman's abdomen.

*Ectopic Pregnancy:* A pregnancy in a place other than the uterus, usually in one of the fallopian tubes.

Egg: The female reproductive cell made in and released from the ovaries. Also called the ovaries

Emergency Contraception (EC): Methods that are used to prevent pregnancy after a woman has had sex without birth control, after the method has failed, or after a rape.

*Fertilization:* A multistep process that joins the egg and the sperm.

Human Immunodeficiency Virus (HIV): A virus that attacks certain cells of the body's immune system. If left untreated, HIV can cause acquired immunodeficiency syndrome (AIDS).

*Intrauterine Device (IUD):* A small device that is inserted and left inside the uterus to prevent pregnancy.

Menstrual Cycle: The monthly process of changes that occur to prepare a woman's body for possible pregnancy. A menstrual cycle is defined as the first day of menstrual bleeding of one cycle to the first day of menstrual bleeding of the next cycle.

*Miscarriage:* Loss of a pregnancy that is in the uterus.

Obstetrician—Gynecologist (Ob-Gyn): A doctor with special training and education in women's health.

*Ovulation:* The time when an ovary releases an egg.

*Pelvic Exam*: A physical examination of a woman's pelvic organs.

*Pelvic Inflammatory Disease (PID):* An infection of the upper female genital tract.

*Postpartum:* Related to the weeks following the birth of a child.

Postpartum Hemorrhage: Heavy bleeding that occurs after the birth of a baby and the placenta.

*Progestin:* A synthetic form of progesterone that is similar to the hormone made naturally by the body.

#### Sexually Transmitted Infections (STIs):

Infections that are spread by sexual contact. Infections include chlamydia, gonorrhea, human papillomavirus (HPV), herpes, syphilis, and human immunodeficiency virus (HIV, the cause of acquired immunodeficiency syndrome [AIDS]).

*Sperm:* A cell made in the male testicles that can fertilize a female egg.

*Uterus:* A muscular organ in the female pelvis. During pregnancy, this organ holds and nourishes the fetus. Also called the womb.

*Vagina:* A tube-like structure surrounded by muscles. The vagina leads from the uterus to the outside of the body.

This information is designed as an educational aid for the public. It offers current information and opinions related to women's health. It is not intended as a statement of the standard of care. It does not explain all of the proper treatments or methods of care. It is not a substitute for the advice of a physician. For ACOG's complete disclaimer, visit <a href="https://www.acog.org/WomensHealth-Disclaimer">www.acog.org/WomensHealth-Disclaimer</a>.

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