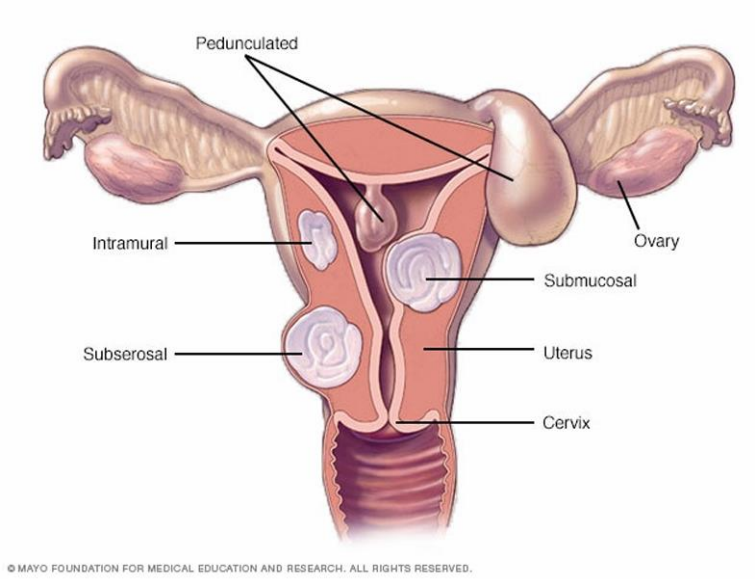
Overview of Fibroid (leiomyomas)



There are three major types of uterine fibroids. Intramural fibroids grow within the muscular uterine wall. Submucosal fibroids bulge into the uterine cavity. Subserosal fibroids project to the outside of the uterus. Some submucosal or subserosal fibroids are pedunculated — they hang from a stalk inside or outside the uterus.

Uterine fibroids are noncancerous growths of the uterus that often appear during childbearing years. Also called leiomyomas (lie-o-my-O-muhs) or myomas, uterine fibroids aren't associated with an increased risk of uterine cancer and almost never develop into cancer.

Fibroids range in size from seedlings, undetectable by the human eye, to bulky masses that can distort and enlarge the uterus. You can have a single fibroid or multiple ones. In extreme cases, multiple fibroids can expand the uterus so much that it reaches the rib cage.

Many women have uterine fibroids sometime during their lives. But most women don't know they have uterine fibroids because they often cause no symptoms. Your doctor may discover fibroids incidentally during a pelvic exam or prenatal ultrasound.

Symptoms

Many women who have fibroids don't have any symptoms. In those that do, symptoms can be influenced by the location, size and number of fibroids. In women who have symptoms, the most common symptoms of uterine fibroids include:

- Heavy menstrual bleeding
- Menstrual periods lasting more than a week
- Pelvic pressure or pain
- Frequent urination
- Difficulty emptying the bladder
- Constipation
- Backache or leg pains

Rarely, a fibroid can cause acute pain when it outgrows its blood supply, and begins to die.

Fibroids are generally classified by their location. Intramural fibroids grow within the muscular uterine wall. Submucosal fibroids bulge into the uterine cavity. Subserosal fibroids project to the outside of the uterus.

Causes

Doctors don't know the cause of uterine fibroids, but research and clinical experience point to these factors:

- **Genetic changes**

  Many fibroids contain changes in genes that differ from those in normal uterine muscle cells.

- **Hormones**

  Estrogen and progesterone, two hormones that stimulate development of the uterine lining during each menstrual cycle in preparation for pregnancy, appear to promote the growth of fibroids. Fibroids contain more estrogen and progesterone receptors than normal uterine muscle cells do. Fibroids tend to shrink after menopause due to a decrease in hormone production.

- **Other growth factors**

  Substances that help the body maintain tissues, such as insulin-like growth factor, may affect fibroid growth.

Doctors believe that uterine fibroids develop from a stem cell in the smooth muscular tissue of the uterus (myometrium). A single cell divides repeatedly, eventually creating a firm, rubbery mass distinct from nearby tissue.

The growth patterns of uterine fibroids vary — they may grow slowly or rapidly, or they may remain the same size. Some fibroids go through growth spurts, and some may shrink on their own. Many fibroids that have been present during pregnancy shrink or disappear after pregnancy, as the uterus goes back to a normal size.

Risk factors

There are few known risk factors for uterine fibroids, other than being a woman of reproductive age. Other factors that can have an impact on fibroid development include:

- **Heredity**
  If your mother or sister had fibroids, you're at increased risk of developing them.
- **Race**
  Black women are more likely to have fibroids than women of other racial groups. In addition, black women have fibroids at younger ages, and they're also likely to have more or larger fibroids.
- **Environmental factors**
  Onset of menstruation at an early age; use of birth control; obesity; a vitamin D deficiency; having a diet higher in red meat and lower in green vegetables, fruit and dairy; and drinking alcohol, including beer, appear to increase your risk of developing fibroids.

Complications

Although uterine fibroids usually aren't dangerous, they can cause discomfort and may lead to complications such as anemia from heavy blood loss.

Pregnancy and fibroids

Fibroids usually don't interfere with getting pregnant. However, it's possible that fibroids — especially submucosal fibroids — could cause infertility or pregnancy loss. Fibroids may also raise the risk of certain pregnancy complications, such as placental abruption, fetal growth restriction and preterm delivery.

Prevention

Although researchers continue to study the causes of fibroid tumors, little scientific evidence is available on how to prevent them. Preventing uterine fibroids may not be possible, but only a small percentage of these tumors require treatment. But, by making healthy lifestyle choices, such as maintaining a normal weight and eating fruits and vegetables, you may be able to decrease your fibroid risk.