Hernias

What is a hernia?
A hernia is a protrusion (bulge) of an organ (generally the intestines) through a defect (hole) in the cavity in which it normally resides. Simply stated, a hernia is a hole in the wall of the abdomen. This results in the intestines or bowel pushing through the hole. Hernias can occur at many locations on the abdominal wall. Most hernias can be detected by a physician during a physical examination. Some hernias are not detectable without additional imaging such as an ultrasound or CT scan.

Types of hernias

Inguinal (groin)
Inguinal hernias are those that typically appear as a bulge in the groin. They are more common in men than women. These hernias may initially present as a small bulge located just above the crease in the groin. Over time, these hernias may progress and enlarge. In men, they may descend into the scrotum.

Some inguinal hernias are difficult to diagnose. Patients may develop small intermittent bulges that show up while performing strenuous tasks. The bulge may not be apparent on physical examination during the early stages. Inguinal hernias may occur at any age.

Femoral hernias
Femoral hernias are a relatively rare type of hernia that occurs below the groin crease on the anterior thigh. These hernias are far more common in females. They are typically seen later in life. A femoral hernia may become incarcerated (trapped). If untreated, an incarcerated hernia may progress to a strangulated hernia (one in which the blood supply has been cut off). Nausea, vomiting and severe abdominal pain may occur with a strangulated hernia. For this reason, incarcerated and strangulated hernias require urgent evaluation and may require emergency surgery.

Ventral hernia
Ventral hernias are those that occur on the anterior abdominal wall (front of the abdomen). These hernias typically occur at areas of weakness in the abdomen. They may occur as a result of prior surgery, coughing, heavy lifting, obesity, smoking or other disorders.

Types of ventral hernias include:

- **Umbilical hernia** – bulge appearing at the navel or belly button. These are one of the most common types of ventral hernia. Small umbilical hernias may be repaired using an open surgical procedure. Hernias that are larger than three centimeters or those that have recurred should be repaired utilizing a mesh (strong, flexible fabric-like material). Laparoscopic repair of these larger or recurrent umbilical hernias will offer patients a quicker recovery and better outcome.

- **Epigastric hernia** – a bulge occurring in the middle of the abdomen above the belly button and below the breast bone. These hernias typically only contain fatty tissue. These hernias are often quite small and may be difficult to diagnose. The defect is often only a few millimeters in size. These small epigastric hernias may be repaired with open or laparoscopic surgery. When these hernias are larger than three centimeters, they should be repaired with mesh. Laparoscopic repair is associated with better outcomes.

- **Incisional hernia** – any hernia that occurs at the site of a prior abdominal incision. These occur in
up to 10 percent of patients who have undergone prior abdominal surgery. Laparoscopic incisional hernia repair has been demonstrated to have better outcomes, a lower recurrence rate and fewer complications than open incisional hernia repair.

- **Parastomal hernia** – a hernia that occurs at the site of a colostomy, ileostomy or other stoma (intestines sutured to the skin). These hernias may be repaired or occasionally may require moving or reversing the stoma.

- **Spigelian hernia** – a hernia that occurs in the lower quadrants of the abdomen, usually at or below the level of the belly button and slightly to either side. Spigelian hernias occur through a natural weakness in the abdominal wall. In most cases, the hernia does not occur through all of the muscles of the abdominal wall, making it more difficult to diagnose.

**Laparoscopic ventral hernia repair**

Almost all ventral hernias may be repaired utilizing a laparoscopic approach. Laparoscopic surgery is performed by making several small incisions on the abdomen. A sheet of mesh (strong, flexible fabric-like material) is then secured to the abdominal wall to reinforce the weakened area of the abdominal wall. The advantages of laparoscopic ventral hernia repair include a quicker recovery, decreased length of hospital stay, quicker return to normal activities, reduced incidence of hernia recurrence and fewer infections.

**Sports hernia**

Sports hernias are small, painful hernias that occur as a result of a tear in the abdominal wall. They occur most commonly in athletes who are participating in sports that involve twisting the leg while running full speed. These hernias cannot be detected by physical examination. Most patients will present with persistent groin pain that lasts for months despite adequate rest. Imaging of the groin with an MRI is generally recommended to exclude other causes of groin pain.

Patients with symptoms consistent with a sports hernia who have persistent discomfort after an appropriate trial of non-operative management may benefit from a laparoscopic repair. Patients will undergo a laparoscopic exploration and repair of the hernia if identified.

**Hiatal hernias**

Hiatal hernias occur inside of the abdomen through the diaphragm. The diaphragm is the muscle that separates the abdomen from the chest and is largely responsible for breathing. The esophagus passes through a small hole in the diaphragm as it enters into the abdomen. This hole in the diaphragm may enlarge over time and allow the stomach or other structures in the abdomen to enter into the chest. Hiatal hernias generally cannot be detected on physical examination. In many cases hiatal hernias are detected on an X-ray performed for unrelated reasons.

Hiatal hernias may result in symptoms of heartburn, regurgitation, reflux, chest pain, difficulty swallowing or painful swallowing. Hiatal hernias that are associated with symptoms should be evaluated by a physician. Not all patients with hiatal hernias will require surgery. However, hiatal hernias associated with symptoms generally require treatment.

Almost all hiatal hernias may be repaired utilizing minimally invasive or laparoscopic surgery. Patients with even the largest of hiatal hernias will benefit from this approach.

**The UK Hernia Program Advantage**

The surgeons at the UK Hernia Program are leaders in minimally invasive surgery and hernia repair. The doctors specialize in all types of abdominal-wall hernias, from the simple to the most complex or complicated hernia. Our team of surgeons focuses on providing patients with the best hernia repair for their condition. Most patients seen at the UK Hernia Program are candidates for a laparoscopic approach. In the event that a minimally invasive operation is not appropriate, our specialists will provide you with expert surgical care.

To find out more about UK Minimally Invasive Surgery, call 1-800-333-8874 or visit www.ukhealthcare.uky.edu/services/generalsurgery.htm