Congenital Umbilical Hernia Symptoms and Treatment

A congenital umbilical hernia is a fascia defect at the umbilicus which is frequently present in the newborn, particularly in premature infants.

Pathology

The defect may have invagination of the intestines or omentum with an overlying skin covering. Its size may actually increase with an increase in intra-abdominal pressure.

The protrusion of bowel through the umbilical defect rarely results in incarceration in childhood. Of these, the most dangerous defects are less than 2cm.

Etiology

The cause is unknown

Incidence

The incidence decreases with age as the natural tendency is to close spontaneously.

A congenital umbilical hernia is very common occurring in 1 out of 1000 births.

The majority of about 50 % are small defects less than 1cm in size-belly button umbilical hernia in those < 2years.
The incidence is highest in blacks.

Signs and symptoms

The disorder is mostly asymptomatic.

Omentum trapped in the hernia causes reflex vomiting without intestinal obstruction.
The classical presentation is reducing mass in the umbilical area with or without vomiting associated with intermittent abdominal pain.

The hernia may become obstructed, strangulated and present as an acute abdomen.

The course of the condition

In most children, the umbilical ring progressively diminishes in size and eventually closes.

Fascial defects less than 1 cm in diameter close spontaneously by 5 years of age in 95% of cases. When the fascial defect is greater than 1.5 cm in diameter, it seldom closes spontaneously.

Surgical repair is indicated when

- The intestine becomes incarcerated
- Symptomatic hernia.
- when the fascial defect is greater than 1 cm, in girls over 2 years
- All children over 4 years of age.
- Cosmesis

In girls must be repaired because the defect may worsen in pregnancy.

some patients with umbilical defects develop acquired umbilical hernia due to an increase in abdominal pressure due to ascites.

Mortality/Morbidity

Intestinal obstruction and infection.
2-12% recurrence after the corrective operation.