

Necrotizing Enterocolitis (NEC) in Newborn Babies

What is Necrotizing Enterocolitis (NEC)?

NEC is an inflammation causing death of part of the bowel. NEC may involve only the innermost lining or the entire thickness of the bowel. The amount of the bowel involved may also vary.

Why do preterm babies get NEC?

Preterm babies have immature and fragile bowels. They are sensitive to changes in blood flow and to infection. We often do not know why a baby gets NEC.

Does using breast milk or formula cause NEC?

Breast milk or formula neither cause nor prevent a baby from getting NEC. Babies fed fresh breast milk do not get NEC as often as babies who are fed formula.

Is NEC serious?

Yes, babies can lose some of their bowel from it. Some babies die of NEC. For this reason, Doctors may start treatment when they suspect that your baby might be getting symptoms of NEC.

How will my baby act if they have NEC?

Your baby may show any or all of the following:

- General signs of being sick: less active, more apnea (irregular breathing pattern), more breathing problems, problem keeping their body temperature normal.
- Poor tolerance to feedings. This is shown by vomiting or by not digesting the milk placed in the stomach. Milk that is not digested, called **aspirate**, may be greenish in colour. This shows that the bowel is not working well.
- Increased size of the tummy.
- Redness or abnormal colour to the tummy.
- Blood in the stool (poop).

What can be done for NEC?

If the Doctor thinks that your baby might be getting NEC, any or all of the following might be done:

- All feedings are stopped for up to 14 days. This is called NPO (short for the Latin words that mean “nothing by mouth”). Your baby will have an IV so they can be given fluids. The feedings will be started again gradually.
- The Nurses and Doctors will feel your baby's tummy and listen to it with a stethoscope. The Nurses will also measure its size with a tape measure.
- X-rays or ultrasounds are taken of the tummy.
- A sample of blood is sent to the lab to see if it contains bacteria.
- Antibiotics are given to your baby by IV.
- More frequent blood tests are done to look for signs of infection and imbalances in the body chemistry.

What happens if part of my baby's bowel dies?

- If only the innermost lining of bowel dies, the body can slowly regrow it.
- If the entire thickness of a piece of bowel dies, a Surgeon may insert a small drain through your baby's tummy to allow any fluid that builds up in the tummy to escape.
- After your baby is better, they may need surgery to remove that piece of the bowel. The end of the bowel above the removed part may be brought to the surface of the skin. This is called a **colostomy**. At some later time, after the baby has recovered and grown bigger, the two ends of the bowel can be sewn back together again.

Are there any long term problems from NEC?

Most babies who recover from NEC do not have further problems, but future problems are possible. These include:

- scarring and narrowing of the bowel causing blockage of the bowel.
- inability of the bowel to absorb nutrients normally.

If you are concerned about something that you think might be a problem, have it assessed by your Medical Team.

If you have questions call:

- Your health care provider.
- The Public Health Nurse or Nursing Station.
- Health Links – Info Santé 24 hours a day at 204-788-8200 or toll free 1-888-315-9257.