



Newborn Jaundice

Jaundice is a yellow discoloration of the skin and the whites of the eyes caused by a build up of bilirubin in the blood. Although jaundice is *not* normal in most people, it is very common and usually normal in healthy newborns.

What causes physiologic (normal) jaundice? It is normal for most babies to be born with extra red blood cells. After birth, these excess red blood cells break down and release bilirubin in the blood stream. The livers of many newborns are not mature enough to metabolize the bilirubin and it thus accumulates in the blood stream. Too much bilirubin can cause problems for the baby, but because we closely monitor the baby's skin color, we can intervene with blood tests and phototherapy before the bilirubin level rises high enough to cause harm.

What causes jaundice that is not "normal newborn jaundice?" In rare situations, jaundice can be caused by medical problems other than the normal break down of red blood cells. Jaundice can represent a problem with a baby's liver, or a problem in which the mother's blood "fights" with her baby's blood within the baby's blood stream. This sometimes occurs if the two blood types are "incompatible." Additional blood tests are sometimes necessary to determine if the jaundice is "physiologic" (normal) or if there is a medical problem causing the elevated bilirubin levels in the blood. Our experience in dealing with newborn jaundice helps us determine when these additional tests are necessary.

What is a normal bilirubin number? Many parents ask this question. In healthy children and adults, a normal bilirubin level is less than 1. In newborns, however, there are several factors to consider when answering this question. It is normal for a newborn's bilirubin level to be in the teens, but we try to prevent the level from rising into the 20's. Healthy babies are never born with jaundice, but many newborns start to develop yellow discoloration in their face around day 2 or 3 of life. Sometimes the yellow color gradually descends down their body, indicating that their blood level of bilirubin is rising. Most babies are as yellow as they're going to get by day 4 or 5. We say the bilirubin level is "peaking" at this time, with the peak number often being around 15 or less. This number then starts to go down and the yellow color gradually goes away.

What do I do if my baby looks more and more yellow? Always call us if you have any concerns about your baby. Rest assured that we will direct you through the first few days after birth, so that you know when to bring your baby to our clinic for "weight and color checks." Our doctors, the hospital nurses, and our clinic staff are very experienced in dealing with jaundice. We know that if a baby's chest is already yellow on day 2 or 3, the bilirubin level in the blood will continue to rise for another couple of days until it peaks on day 4 or 5. We will therefore start testing the bilirubin level in the blood, probably daily for a few days, to determine how much the number is increasing each day. If testing reveals a high or a rapidly rising number, we will intervene with phototherapy as needed.

What is phototherapy? This is a treatment for newborn jaundice, where ultraviolet light is shined onto a baby's skin, which helps metabolize the bilirubin molecule so it can leave the body. If phototherapy is started while the baby is still in the hospital, the lights will likely come from a lamp shining down on the naked baby in her bassinet. If phototherapy is done at home, the lights will probably be in a device that comes in direct contact with the baby's body, like a wide belt that wraps around the baby's torso or a paddle with lights that is strapped on to the baby's back. Be sure there is no clothing between the lights and the baby's skin!

If phototherapy is necessary, our nurses will make arrangements with a home health agency that works with your insurance plan. A professional from their agency will meet you in your home to set up the equipment and teach you how to operate it. While phototherapy is taking place, a blood bilirubin test will be done daily. We will tell you where to have the blood drawn, ie at our office, at the hospital lab, or in your home by a home health nurse. Each day, we will notify you of the test results and give you further directions. If you do not hear from us by mid-afternoon each day, please call for further instructions.

Why do some babies still look yellow after several weeks of age? Normal physiologic jaundice typically peaks around day 4 or 5 and then begins to fade, with or without phototherapy. Sometimes, however, this normal jaundice lasts for several weeks. We know that breast fed babies tend to "hold on to their jaundice" a bit longer than formula fed babies. This prolonged "**breast milk jaundice**" is not considered a problem, as long as other blood tests are normal, the bilirubin blood level remains in an acceptable range and doesn't increase again, and the baby is otherwise healthy and gaining weight.

If **breast milk jaundice** is thought to be present, some physicians might ask you to stop nursing and feed your baby formula for 12-24 hours. If the bilirubin level drops, a diagnosis of "breast milk jaundice" can usually be assured, and your baby can resume breast feeding. If you feed your baby formula, you need to decide whether to do this with a bottle, a syringe or with a tube at the breast (see bottle / finger feeding handout). Ask your doctor or a lactation consultant for advice. During this time, you will need to remove milk from your breasts every 3 hours in order to maintain your milk supply. Use a double electric breast pump, such as the Symphony, Lactina, or Pump In Style, all made by Medela (see breast pump handouts). Save the milk and feed it to your baby at a later time.

Are there things that can be done to prevent jaundice? Jaundice is more common in babies that are breast fed, but the benefits of breast milk outweigh the inconvenience of dealing with jaundice. Other issues that predispose a baby to jaundice, but are usually out of our control, are prematurity, certain blood type variations, other newborn illnesses or stress during birth. Nursing your baby frequently soon after birth helps stimulate the baby's gut to help pass the bilirubin out of their system. Thereafter, nurse frequently on demand so your baby remains well hydrated. Do not give water. Yellow babies are often sleepy, so you may need to work to keep him awake to nurse. Unwrap him, change his diaper, rub his back and use a cool cloth to wake him up. Ask for help if your baby is not latching well. You can also place your baby near a window in the sunlight to sleep during the day. Keep the room warm and dress your baby only in a diaper so the light can reach his/her skin.

Please call us if you have any questions or concerns about jaundice or anything else: 489-3834