

Let's Talk About...

Bone Marrow Aspirate and Biopsy

Inside some of our bones is a spongy material called bone marrow. Bone marrow makes red blood cells, white blood cells, and platelets (PLATE-letz). They are all part of the blood that flows in our bodies.

A bone marrow aspirate (AS-per-ate) is a test to see if the bone marrow is making blood cells correctly. A biopsy (BY-op-see) is a test in which your doctor takes a little bit of bone marrow tissue and looks at it under a microscope.

Why is it needed?

Blood tests give a certain kind of information about your child's condition. Your doctor may need different information. Looking at the bone marrow can help your doctor diagnose different diseases. He can also determine how far a disease has progressed. He can evaluate how effective certain treatments have been.

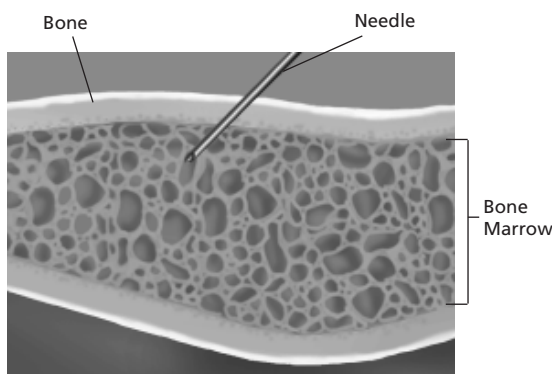


Figure 1

What are the procedures?

A needle is placed into the bone marrow and a small amount of bone marrow fluid is pulled up with a syringe (see Figure 1). Then a new, larger needle is put in the same place to get a small piece of bone marrow. It is removed and examined.

What happens first?

A Child Life specialist will be with you during the tests. She will explain what is going on and help your child relax. Some parents are uncomfortable staying for the procedure. That is all right. Tell your Child Life specialist. She will be there to help you and your child.

Your child will lie on her side on an exam bed (see Figure 2 on back). A pillow or towel will be placed under the hips to raise them up. The site where the doctor will do the test will be washed with an antibacterial soap. The nurse will place sterile towels around the area.

A small amount of numbing medicine will be injected into the skin where the test will take place so your child will not feel it as much. The needle may sting, but not for long as the numbing medicine takes effect.

What happens during the test?

The two tests are performed very quickly. After the area is numb, a needle is placed into the bone marrow. A small amount of the marrow fluid is taken, or aspirated (As-per-a-ted). Your child may feel pressure or feel pain very briefly. The needle is removed.

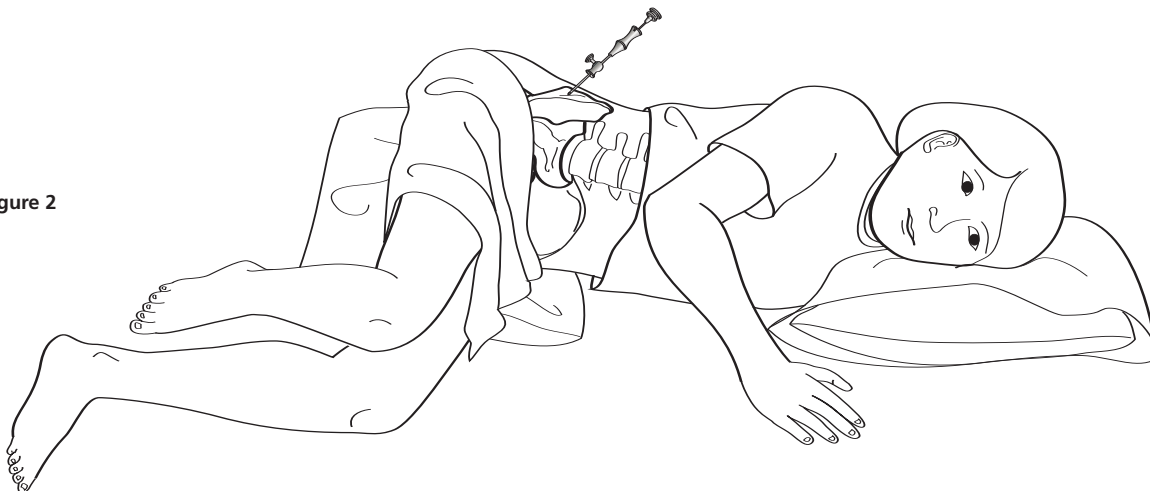
The biopsy is done next. A new, larger needle is put in the same place and is twisted to get a small piece of bone marrow. Your child may feel pressure from the doctor pushing the needle into the bone. The doctor will wiggle the needle to loosen it from the bone. He will remove the needle and send the little piece of bone marrow to the lab for examination.

What will happen after the test?

Your child's skin will be washed off with antibacterial soap. Pressure will be put on the site

Continued on back

Figure 2



for a few minutes to stop the bleeding. A tight-fitting bandage will be put on the area where the test was done. This dressing should stay on for 24 hours to prevent bleeding. It is normal for your child to be sore for a few days.

Are there complications?

There is always a slight possibility of complications with any procedure. One possible complication is a risk of infection, which can

be treated with antibiotics. Bleeding can also occur at the site of the test, but these reactions happen rarely.

Call your doctor if...

- Your child has a fever.
- There is bleeding at the site of the biopsy, or if the area is red and inflamed.



PRIMARY CHILDREN'S MEDICAL CENTER
IHC A Service of Intermountain Health Care

Pediatric Education Services
(801) 588-4060 Rev. 3/04
© Primary Children's Medical Center 2004

All of the information contained in the *Let's Talk About...series* is for educational purposes only. This educational information is not a substitute for medical advice or for care from a physician or other health care professional. If you have questions about your child's health, contact your health care provider.