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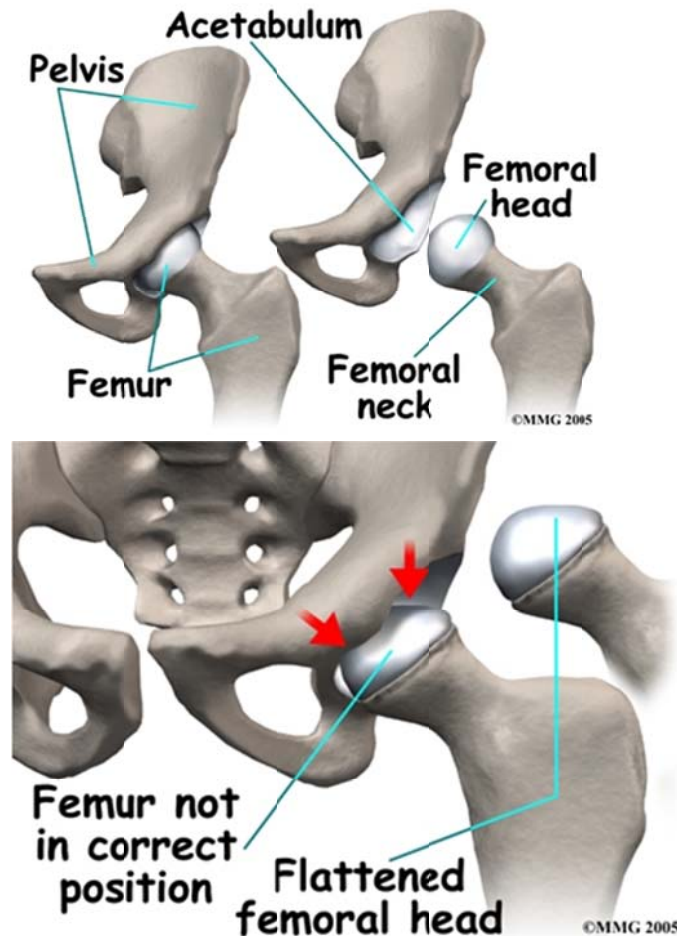
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**Legg-Calve' Perthes**

**What is Legg-Calve' Perthes?**

Legg-Calve' Perthes is a condition that often occurs in children ages 2 to 12 years. The upper part of the large bone in the thigh (femur) loses its blood supply for a period of time. This causes damage to the hip joint. The medical term is Avascular necrosis ("a-vass-cue-lar neck-row-sis"). Usually only one hip joint is affected. It is more common in boys. It is not a contagious disease.

The hip joint is where the thighbone (*femur*) connects to the pelvis. The joint is made up of two parts. The upper end of the femur is shaped like a ball. It is called the *femoral head*. The femoral head fits into a socket in the pelvis called the *acetabulum*. This ball and socket joint is what allows us to move



Perthes disease changes the structure of the hip joint. How much it affects the way the hip joint works depends on how much the hip joint is deformed. Problems later in life are more likely the greater the deformity after the condition has healed. In general, the most common problem later in life is the development of arthritis in the hip joint. The type of arthritis that develops in the hip is *osteoarthritis* (also known as wear and tear arthritis). Just like a machine that is out of balance, the hip joint wears out

### What causes it?

The cause is not known but it is more common in some families where other family members have also had the condition.

### *How does it affect my child?*

Perthes usually has several stages. The stages happen over a period of months to years. The stages may not follow in order, and parts of each stage may occur at the same time.

#### Initial stage:

- 2 to 3 months
- Blood supply is lost
- Hip pain and limited motion
- X-rays still look normal

Healing stage:

- 9 to 12 months
- Condition progressing
- Hip bone is soft and loses shape easily
- Pain in the hip
- Condition is often diagnosed in this stage
- Bone begins to heal and normal strength of joint returns later in this stage

Healed stage:

- The joint is healed
- Bones may be able to remodel or return
- The younger the child, the better the chance for remodeling

#### *What tests will be done?*

X-rays and possibly a bone scan are done to see what stage the condition is in. These tests also show how the joint has been affected. Other tests may also be done to look at the structure of the bone. After the tests are done, treatment will be started.

#### *How is it treated?*

Treatment will help reduce damage to the hip joint. Without treatment, your child has a greater risk of having hip arthritis. This could affect movement and cause pain.

Possible treatment methods are:

- Traction of the leg(s): This is used to improve the motion of the hip. Your child would need to be in the hospital to have traction done.
- Braces or casts: Some children may have to wear a brace or be in long leg casts for a period of time. Braces or a cast help keep the ball of the thighbone in the hip socket and keeps the hip muscles stretched.
- Hip surgery: A small number of children with severe hip joint problems will need surgery. Surgery is done to hold the bones in place within the socket. Screws and/or plates are used and stay in place until the condition has run its course. After surgery, a brace is worn for about 8 weeks or until the hip is healed. After the brace is taken off your child can go back to normal activities.

*What follow-up care is needed?*

- Your child will need ongoing medical care, x-rays and checkups until reaching maturity (about age 14 in girls or age 16 in boys). If surgery is performed, the screws and/or plates will be removed after about 12 months. Removal will require a short hospital stay.
- For about 8 weeks after the hardware is removed, your child should not run or jump.
- When treatment and healing are complete, the affected leg may be slightly shorter than the other leg. This problem may correct itself. Some children, however, may need surgery on the unaffected leg to slow its growth. This will allow the shorter leg to catch up.

**ALERT:** Call your child's doctor, nurse, or clinic if you have any questions or concerns or if your child:

- Has any new pain in the hips, groin, thighs or knees that the doctor is not already aware of.
- Has any problems with the cast or brace. Look at the book given to you on cast care.
- Has special health care needs that were not covered by this information.