

### Alfred I. duPont Hospital for Children

### Nemours Children's Clinic

### Adductor Lengthening / Hip Muscle Release

### Why does my child need this surgery?

These muscles often become tight due to spasticity, and require releasing. There are three major indications for these releases:

Tight adductors cause an imbalance in the ball and socket joint that we call the "hip." The result of this imbalance is a subluxation and eventual dislocation of the hip. This is the process of the "ball" moving out of the "socket." It typically occurs between the ages of 3 and 6, although it may occur at any time. It is extremely beneficial to deal with this subluxation before the hip fully dislocates, since this muscle surgery is far preferable to the bony surgery necessary when the hip is dislocated.

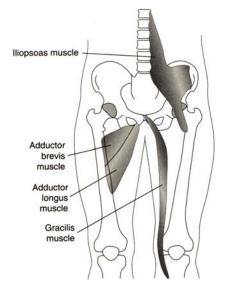
The second indication for this surgery is to help a child who is walking or trying to walk and having trouble with "scissoring." This occurs when the legs cannot be spread apart and constantly cross over each other. This problem sometimes resolves without surgery. However, when it persists, and impedes walking, most commonly between the ages of 5-10.

The third indication for this surgery is to improve the ability to provide perineal care by lengthening the muscles so that the legs can be spread apart. These tight muscles can make it very difficult for toileting and hygiene care.

#### What does the surgery involve?

The surgery typically involves the adductor longus and gracilis muscles located in the groin. These muscles are cut completely and allowed to retract and will then scar down to their underlying muscles. If the contracture is severe, the adductor brevis is also partially lengthened. In addition, the anterior branch of the obturator nerve is cut in order to further weaken these muscles.

In addition to these muscles, the iliopsoas muscle is a large muscle that is also often in need of lengthening. It is accessible through the same incision. It has two components, the iliacus and the psoas. In children who are severely impaired and unlikely to ever walk, both these are addressed. In children who are likely walkers, just the psoas is addressed.



### ${f W}$ hat are the incisions like?

The incisions are quite small, often one to one and one half inches and are well concealed in the crease of the groin.

## What happens immediately after surgery/casts?

After surgery a dressing is placed over the incision. The sutures are self-dissolving. There is no casting. However, some surgeons may have the child us a brace or pillow device that allows the legs to remain apart and stretched, especially for sleep.

### Will my child have pain?

Yes. However, the pain will be controlled with pain relievers and muscle relaxants. If, after your child returns home, you feel that he/she is having inappropriate pain or side effects from the medications, please call the office.

## Will my child be able to walk/activity at discharge?

If your child was ambulatory prior to surgery, he may need additional support for a short time, such as a walker or crutches.

#### Will my child be able to ride in the car?

There should be no problem with riding in the car after this procedure.

#### Will my child need physical therapy?

Yes. The therapists will work with your child in the hospital and you will be given a prescription for therapy when you are discharged. The therapy will focus on stretching, strengthening and ambulation training.

The social worker will help with arranging for therapy. However, individual insurance coverage will often dictate what therapy is possible. It is very helpful for families to inquire about their coverage prior to surgery in order to facilitate the process of obtaining what is needed for their child.

# When will my child need to return to see the doctor/x-ray?

The typical post-operative visit is in four weeks. No x-rays will be necessary.

# When will my child be able to return to school?/bus?

This is variable. Most children are comfortable enough to return to school after two weeks. If the child has had other procedures done at the same time, it may take longer for him/her to feel comfortable. The additional factors involved in returning are the length of the bus ride and the ability of the school to accommodate the child.

## How long will it be until my child has completely recovered?

This too is variable. Full recovery generally takes three to four months.

# Will this surgery ever need to be repeated?

If a child is young when this procedure is done, and has a great deal of tone, it is possible that these adductor muscles may have to be lengthened again in the adolescent period.

# What are the possible complications associated with this surgery?

Infections can occur. However, they are usually minor and do not delay recovery.

Additional complications involve the overrelease of these muscles, which causes the legs to be contracted in a spread-open position. This is detrimental for children who are walkers in that it produces a wide based gait. Even in children who are sitters, it is cosmetically unappealing. A combination of over-correction on one side and under correction of the other can cause a " windswept ' appearance. This deformity can occur without medical intervention as well. Every effort is made during surgery to lengthen these muscles so that these complications do not occur.