

ACL RECONSTRUCTION REHABILITATION PROTOCOL

RESTORE NORMAL RANGE OF MOTION

You should attempt to achieve full range of motion as quickly as possible. Quadriceps isometrics exercises, straight leg raises, and range of motion exercises should be started immediately.

Full extension is obtained by doing the following exercises:

1. Passive knee extension.

Sit in a chair and place heel on the edge of a stool or chair.

Relax the thigh muscles.

Let the knee sag under its own weight until maximum extension is achieved.

2. Heel Props:

Place the heel on a rolled towel making sure the heel is propped high enough to lift the thigh off the table.

Allow the leg to relax into extension.

3-4 times a day for 10-15 minutes at a time.

3. Prone hang exercise.

Lie face down on a table with the legs hanging off the edge of the table.

Allow the legs to sag into full extension.

Bending (Flexion) is obtained by doing the following exercises:

1. Passive knee bend.

Sit on the edge of a table and let the knee bend under the influence of gravity.

2. Wall slides are used to further increase bending.

Lie on the back with the involved foot on the wall and allow the foot to slide down the wall by bending the knee. Use the other leg to apply pressure downward.

3. Heel slides are used to gain the final degrees of flexion.

Pull the heel towards the buttocks, flexing the knee. Hold for 5 seconds.

Straighten the leg by sliding the heel downward and hold for 5 seconds.

In later stages of rehabilitation, do heel slides by grasping the leg with both hands and pulling the heel towards the buttocks.

Develop muscle strength

Once over 100 degrees of flexion (bending) has been achieved you may begin to work on muscular strength:

1. Stationary Bicycle: Use a stationary bicycle two times a day for 10-20 minutes to help increase muscular strength, endurance, and maintain range of motion.
2. Swimming is also another exercise that can be done during this phase to develop muscle strength and maintain range of motion.
3. Low impact exercise machines such as elliptical cross-trainer, leg press machine, leg curl machine, and treadmill can also be used. Please consult with Dr. Weber before beginning any of the above exercises.

This program should continue until you have achieved a full range of motion and good muscular control of your leg (able to walk without a limp).