Epiphysiodesis

An epiphysiodesis (e-pif-uh-si-o-desis) is a surgery to temporarily or permanently stop the growth of part or all of the growth plate at the epiphysis (end of the bone). This surgery is usually done for one of two reasons. One reason is for a leg length difference of two to five centimeters (about one to two inches). Another reason is for a problem with the angle of the leg bones (i.e. bowed legs, knock-knees). X-rays help the doctors decide when the surgery needs to be done.

For Leg Length Difference
The surgery is done on the longer leg. There is a growth plate at the upper and lower ends of each bone. The doctor will operate on one or more of the growth plates through two small incisions. The incisions will be on the inner and outer portions of the leg. The bone stops growing where the surgery was done but will continue growing at the other end. This allows the shorter leg to “catch up” in growth.

For Angle of the Leg Bones
In this case, only one side (inner or outer portion) of the growth plate is removed or slowed with a plate. The other side of the growth plate continues to grow and corrects the angular problem over time. For example a child with genu varum (bowed legs) from Blount’s disease will have the outer portion of the growth plate removed or slowed. A child with genu valgum (knock-knees) will have the inner portion of the growth plate removed or plated.

Facts about the Surgery
• Two weeks before surgery, do not allow your child to take any aspirin, ibuprofen (i.e. Motrin®), Advil®, Aleve® or herbal medications.
• An epiphysiodesis usually requires a one to two day hospital stay.
• A soft cotton wrap and an ace wrap are placed on the leg after the surgery. Your child may wear a knee immobilizer (a soft removable brace) for one to two weeks for comfort and support. He will need crutches and pain medicine for a few days after discharge from the hospital.
• The doctor will need to see your child in one to two weeks to check the incision and the range of motion.
• Your child should be walking as usual in about two weeks and can resume athletic activity in about six weeks.
• An immediate correction will not be seen. It may take several months before a change is noticed.
• It is very important to come to follow-up visits so the doctor can check the growth and/or angle change.