

M. E., boy 18 years of age with paralysis of thigh muscles except sartorius. The sartorius was transplanted into fascia of quadriceps and after six months the limb was markedly improved. While he could not extend the leg completely with weak extensor yet it was sufficiently strong to keep the leg extended while walking and to prevent the knee *buckling* as it did previously.

J. W., act. 8. Peroneus longus inserted into paralysed tendon of tibialis anticus and a valgus position of foot corrected, so that with a shoe with slight lift on the inside, patient was able to do without support and to walk with a stable and secure foot.

L. S. boy of 7 years—with marked valgus and severe disability—paralysis of flexor longus hallucis as well as tibialis anticus and posticus. Boot could not be satisfactorily held with outside support and T strap—peroneus longus was inserted into tibialis anticus as in last case and a section of tendo Achillis split off and inserted into a slit in the tendon of flexor longus hallucis. This was a most satisfactory recovery. Boy walks with a secure foot and no valgus—and easily walks a couple of miles to school.

In all these cases five to six weeks should be allowed before any strain is put upon the transplanted tendon for tendons unite slowly and may give way if used earlier. For the same reason catgut should never be used as a suture to fasten one tendon into another as it absorbs too quickly—kangaroo tendon is satisfactory or fine silk may be used.

#### IV. CASES WHERE SO LITTLE MUSCULAR TISSUE IS LEFT AS TO BE USELESS FOR SUPPORT AND WHERE SUPPORTS ARE NOT ADVISABLE.

One sees cases where a complex support is necessary in order to allow patient to get about, and in active and growing boys one sees these appliances constantly in the repair shop. If patient lives at a distance and repairs cannot be easily made any other means which may allow of simpler appliances being used is readily accepted. In such a case where there is no control of extension at knee and continuous treatment with appliances is not feasible, the knee joint can be excised and a stiff joint secured which will allow patient to get about without apparatus. In some cases of uncontrolled ankle movement *arthrodesis* at the ankle may be employed thus producing ankylosis and a stable foot giving a firm base of support. This in children is not so satisfactory as in adults as much freedom of motion often follows at the astragalo-calcaneus and astragalo-scaphoid joint and the foot again becomes insecure.

Whitman describes a very ingenious plan of backward displacement of the foot which may be used in conjunction with arthrodesis, especially in cases of calcaneus deformity. In this class the patient walks on the