

various, and the details are so numerous that an extensive literature has grown up in its advocacy.

(b) Arthrodesis: By this term is meant the fixation by operative means of a flail joint. A wobbling, disabled joint through loss of muscular control may often be rendered functionally efficient by denuding the joint surfaces till red bleeding bone is exposed, bringing these into apposition, and maintaining them in this relation until a synostosis is secured. This operation is applicable more especially to the joints of the lower extremity, though it may be usefully employed also at the shoulder. It is employed very generally in the treatment of paralytic disabilities of the foot, and meets a large demand on the part of the orthopedic surgeon.

Supplementary to the operative work done, the careful surgeon will employ suitable physical training and mechanical aids. Without such careful after-treatment relapses will often follow, and generally results will fall short of those which can be obtained if the case were followed up and kept under constant observation.

The literature of the surgical means to be employed is so extensive that no effort is made here to do other than intimate the general principles to be followed. The attached bibliography indicates but a very small proportion of the recent articles dealing with this subject.

Townsend—*American Journal of Orthopedic Surgery*, August, 1908.

Sachs, Bradford, Hunkin, Taylor—*American Journal of Orthopedic Surgery*, November, 1908.

Haynes, Zabriskie, Romeiser, Sayre, Townsend, in *Archives of Pediatrics*, December, 1908.

Jones—*British Medical Journal*, March 28, 1908.