

CHAPTER III.

THE REGION OF THE SHOULDER.

ANATOMY.

ACTION OF MUSCLES.

LANDMARKS.

SYNOVITIS.

BURSÆ.

DISLOCATIONS.

ATROPHY OF DELTOID.

OPERATIONS.

The **Shoulder Joint** is an enarthrodial or ball-and-socket joint, and is composed of a humeral head, nearly hemispherical in form, pointing upwards, inwards and backwards, and articulating with the shallow glenoid fossa of the scapula. It is protected, from above, by an arch composed of the coracoid and the acromion processes with the coraco-acromial ligament uniting them. The capsular ligament which encircles the articulation is lax and does not maintain the joint surfaces in apposition, so that, were it not for the atmospheric pressure and the tonicity of the muscles, that, controlling the joint, are attached to the capsule, the humerus would be separated at least one inch from the glenoid fossa. The area of the articular end of the humerus is about three and a half times that of the glenoid fossa, and this arrangement, whereby a larger surface rests on a smaller one, permits great freedom of movement at the joint. The articular surface of the humerus is not exactly hemispherical, being longest in a direction, downwards and inwards from the upper end of the greater tuberosity, and consequently, elevation of the arm is freest in the reverse direction, viz., upwards and outwards, as evidenced by the ease with which the hand may be placed behind the head. In an antero-posterior direction the greatest movement is permitted when the arm is raised to a right angle, since this position allows the widest part of the head of the bone to be brought into play on the glenoid surface.