

Bony Landmarks of the Upper Extremity

Bone	Bony Landmark	Associated Structures
Clavicle	Acromial end	Articulates with the acromion process of the scapula
	Sternal end	Articulates with the sternum
	Conoid tubercle	Attachment site for the coracoclavicular ligament
Scapula	Glenoid fossa	Articulates with the head of the humerus
	Coracoid process	Attachment site for the coracobrachialis, short head of the biceps brachii, & pectoralis minor muscles & coracoclavicular ligament
	Acromion process	Articulates with the clavicle, attachment for the middle part of the deltoid
	Scapular spine	Separates the supraspinous and infraspinous fossa, attachment for the deltoid and trapezius muscles
	Medial border	Attachment for the levator scapulae, rhomboid major, rhomboid minor, & serratus anterior (anterior portion of the medial border)
	Lateral border	Attachment for teres minor
	Superior border	No attachments
	Inferior angle	Attachment site for the teres major muscle
	Superior angle	Attachment for the levator scapulae
	Subscapular fossa	Fossa on the anterior scapula that holds the subscapularis muscle
	Supraspinous fossa	Fossa on the posterior surface that holds the supraspinatus
	Infraspinous fossa	Fossa on the posterior surface that holds the infraspinatus
	Supraglenoid tubercle	Attachment for the long head of the biceps brachii
	Infraglenoid tubercle	Attachment for the long head of the triceps
Suprascapular notch	Passageway for the suprascapular nerve	
Humerus	Head	Articulates with the glenoid fossa of the scapula
	Anatomical neck	Just distal to the head of the humerus
	Surgical neck	Common site for fractures of the humerus
	Deltoid tuberosity	Attachment for the deltoid muscle
	Lesser tubercle	Attachment for the subscapularis muscle (and teres major)
	Greater tubercle	Attachment for the supraspinatus, infraspinatus, and teres minor
	Intertubercular sulcus (groove)	Passageway for the tendon of the long head of the biceps; attachment for the latissimus dorsi and teres major muscles
	Radial groove	Radial nerve travels here on its course around the posterior humerus
	Medial epicondyle	Attachment site for muscles of the anterior forearm (flexors and pronator teres)
	Lateral epicondyle	Attachment site for muscles of the posterior forearm (extensors and supinator)
	Lateral supracondylar ridge	Attachment site for some posterior forearm muscles
	Medial supracondylar ridge	Attachment site for some anterior forearm muscles
	Capitulum	Articulates with the head of the radius
	Trochlea	Articulates with the ulna
	Radial fossa	Space for radius during elbow flexion
	Coronoid fossa	Space for the coronoid process of the ulna during elbow flexion
	Olecranon fossa	Space for the olecranon process of the ulna during elbow extension
Ulna	Trochlear notch	Articulates with the trochlea of the humerus
	Olecranon process	Attachment for the triceps brachii
	Coronoid process	Attachment for ligaments of the elbow
	Radial notch	Distal articulation with the head of the radius
	Head	Articulates distally with the radius and with carpal bones
	Styloid process	Attachment for a ligament of the wrist
Radius	Head	Articulates with the ulna and humerus
	Radial tuberosity	Attachment for the biceps brachii tendon
	Styloid process	Attachment site for the brachioradialis muscle
	Ulnar notch	Distal articulation with the ulna