

**The University Of Jordan  
Faculty Of Medicine**



# Muscles of The Arm

By

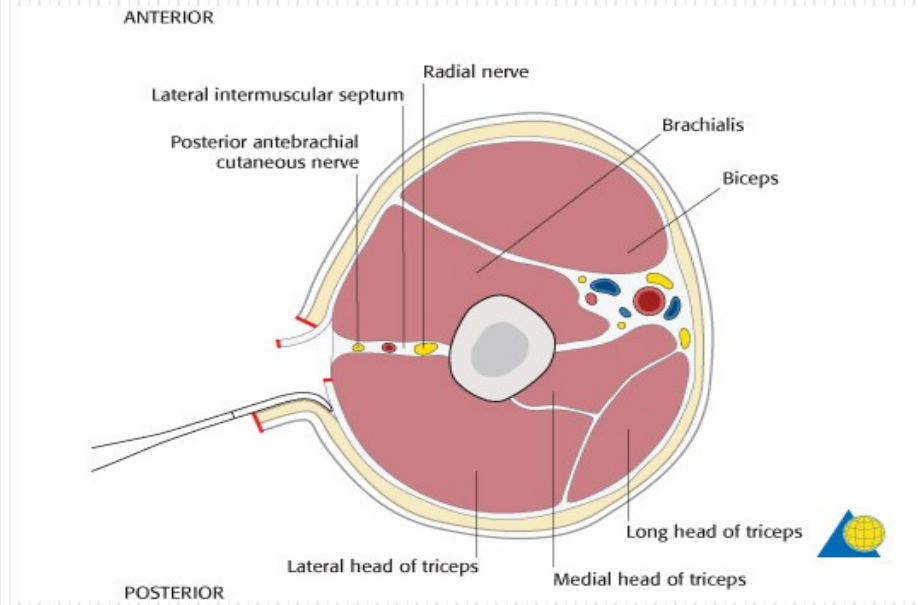
**Dr.Ahmed Salman**

**Associate Professor of Anatomy**

# Compartments of the arm

The arm is divided into two compartments by two (medial and lateral) intermuscular septa:

- Anterior (flexor).
- Posterior (extensor).



# Muscles of The Arm

## **Front**

1- Coracobrachialis

2- Biceps Brachii

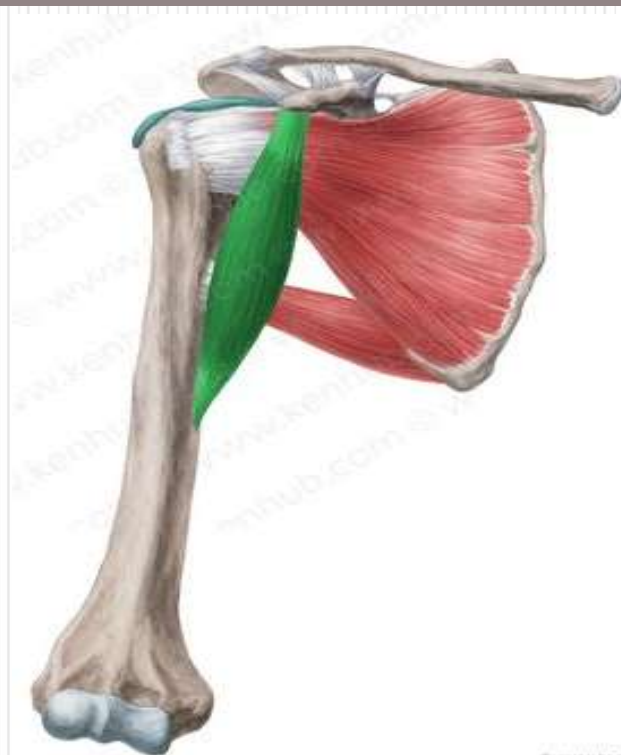
3- Brachialis

All are supplied by Musculocutaneous nerve and they are flexors

## **Back**

1- Triceps is supplied by radial nerve and it is extensor

# Coracobrachialis



## **Origin**

Coracoid process of scapula

## **Insertion**

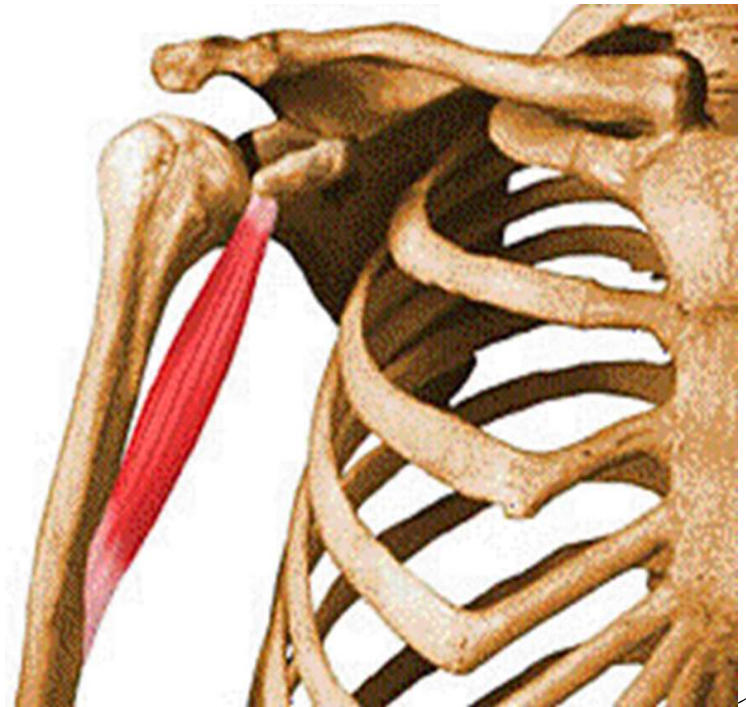
Middle of the medial border of the humerus

## **Nerve supply:**

Musculocutaneous nerve .

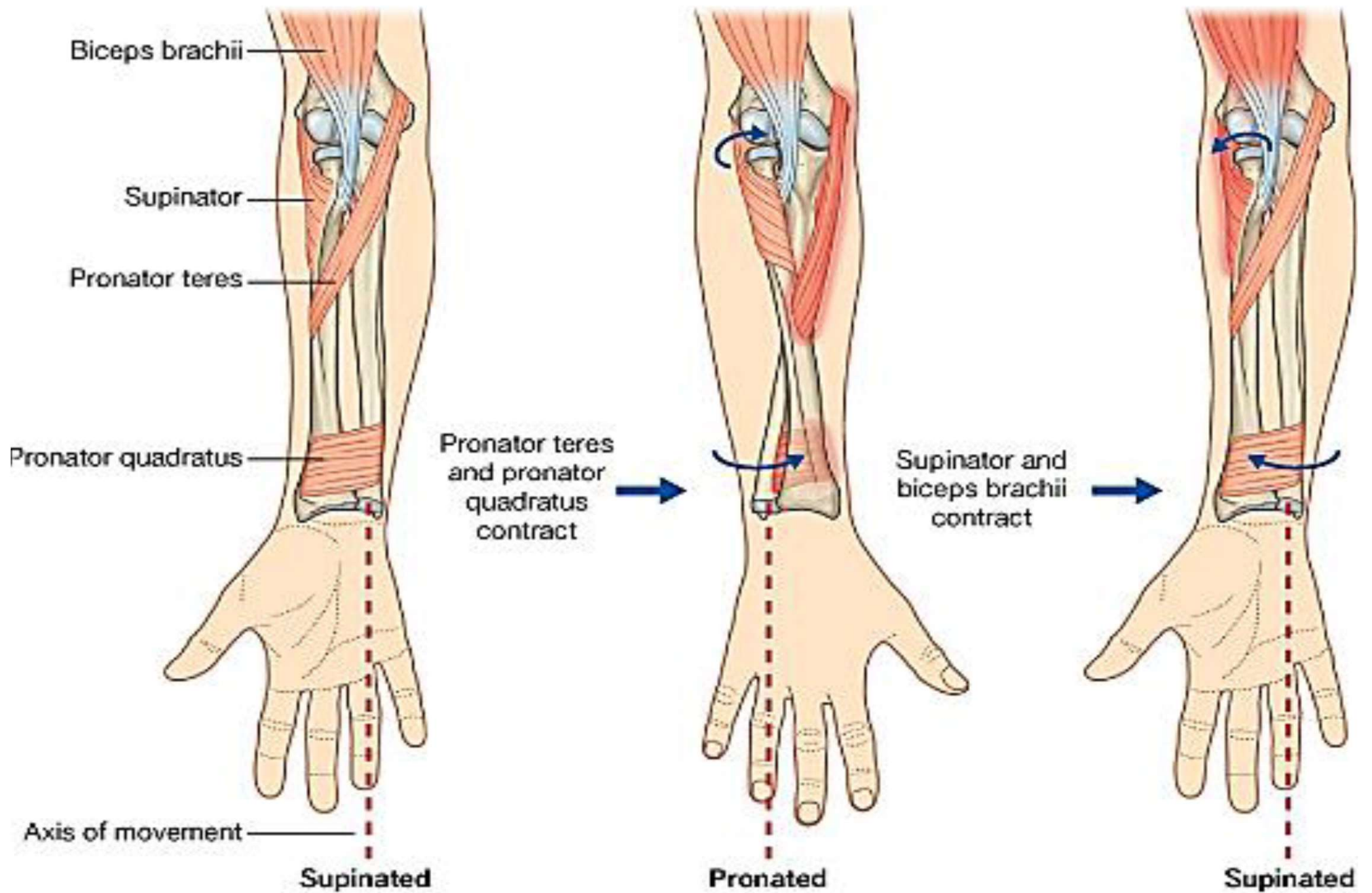
## **Action:**

Flexion of the arm.



# Biceps brachii





Dr. Ahmed Salman

## Origin

has 2 heads

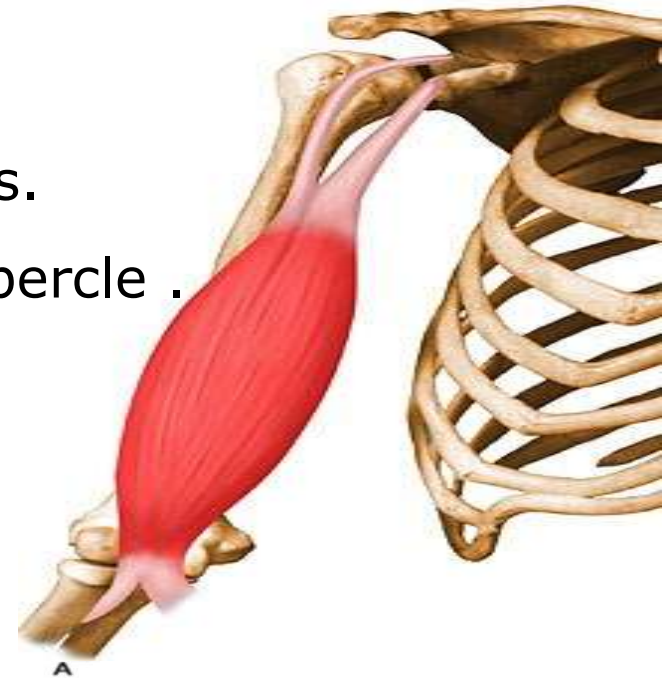
**1-Short (medial) head:** coracoid process.

**2-Long (Lateral) head:** supraglenoid tubercle .

within the capsule of the shoulder joint

## Insertion

Radial tuberosity of radius



A

Head

Neck

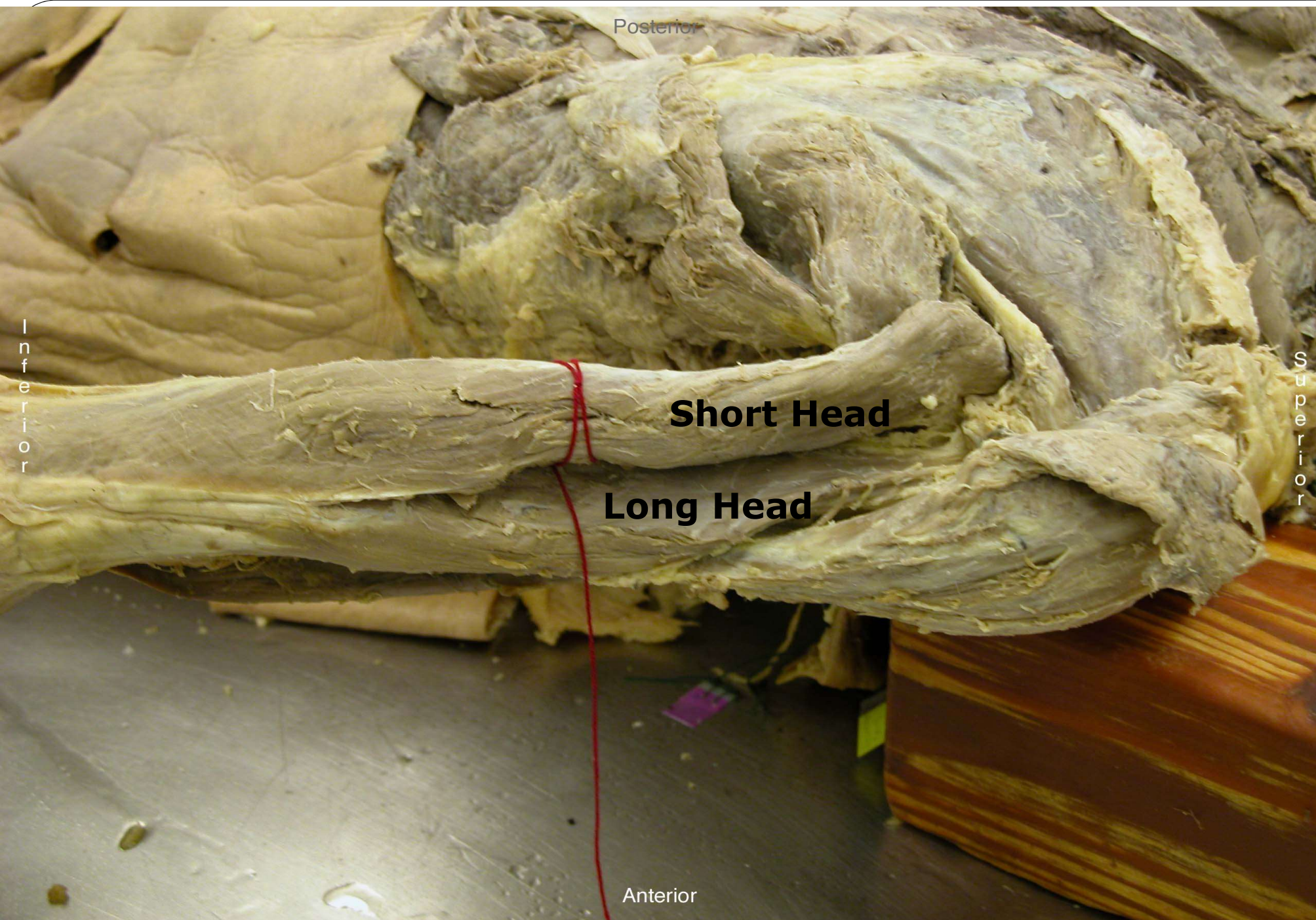
Radial tuberosity

Oblique line

Lateral

Medial





Posterior

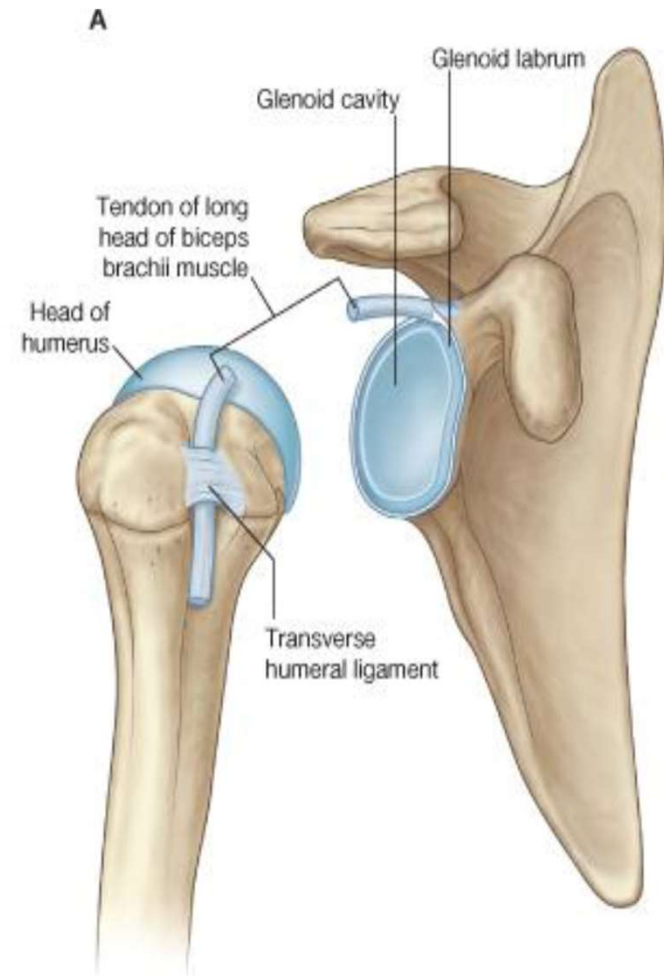
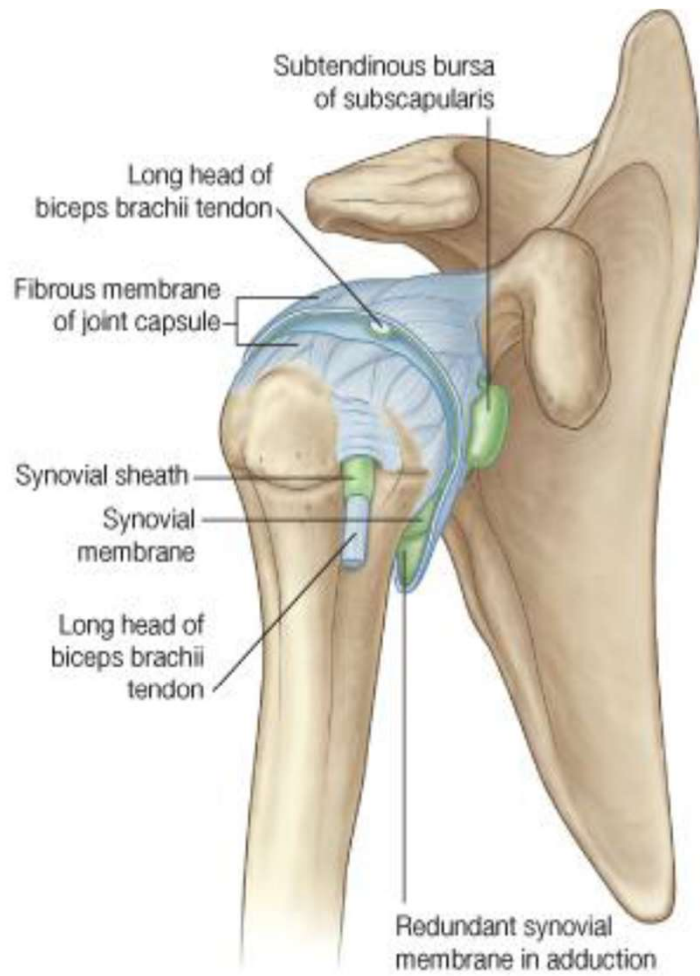
**Short Head**

**Long Head**

Anterior

Inferior

Superior



**Nerve supply:**

Musculocutaneous nerve .

**Action:**

1. Flexion of the arm
2. Flexion of the elbow
3. Supinator of the semi-flexed forearm



# Brachialis



## Origin

The lower ½ of the front of the humerus

## Insertion

Coronoid process of the ulna.



© Elsevier. Drake et al: Gray's Anatomy



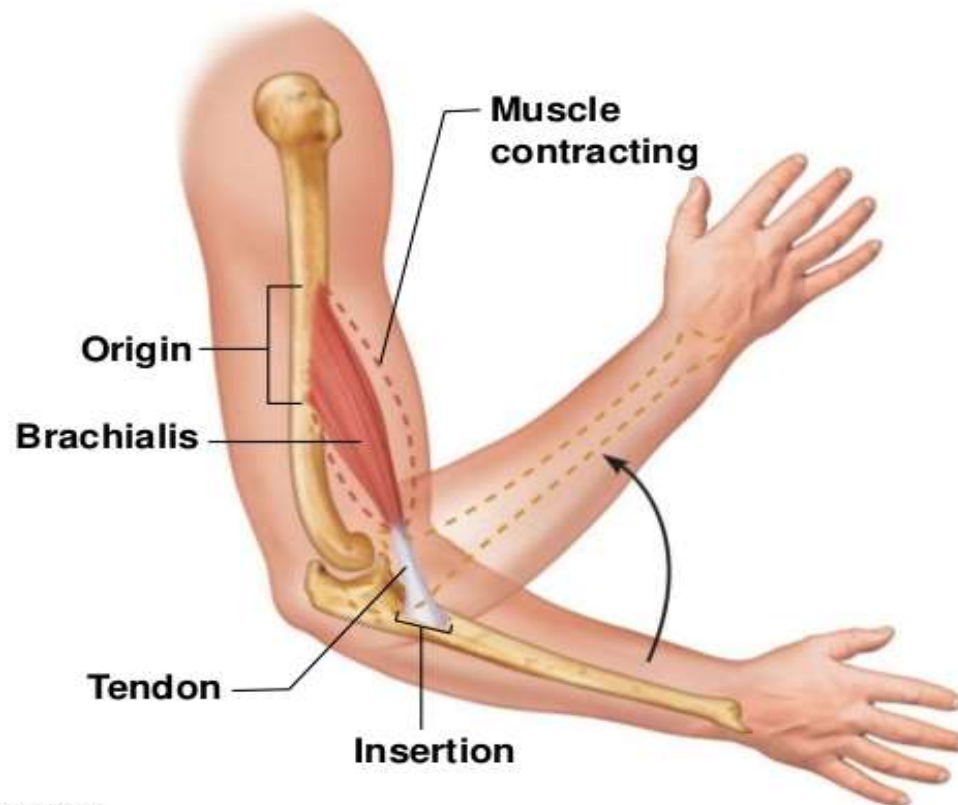
## **Nerve supply:**

Musculocutaneous nerve .

Its lateral fibers are supplied by the radial nerve.

## **Action:**

Main flexor the forearm.



# Triceps brachii



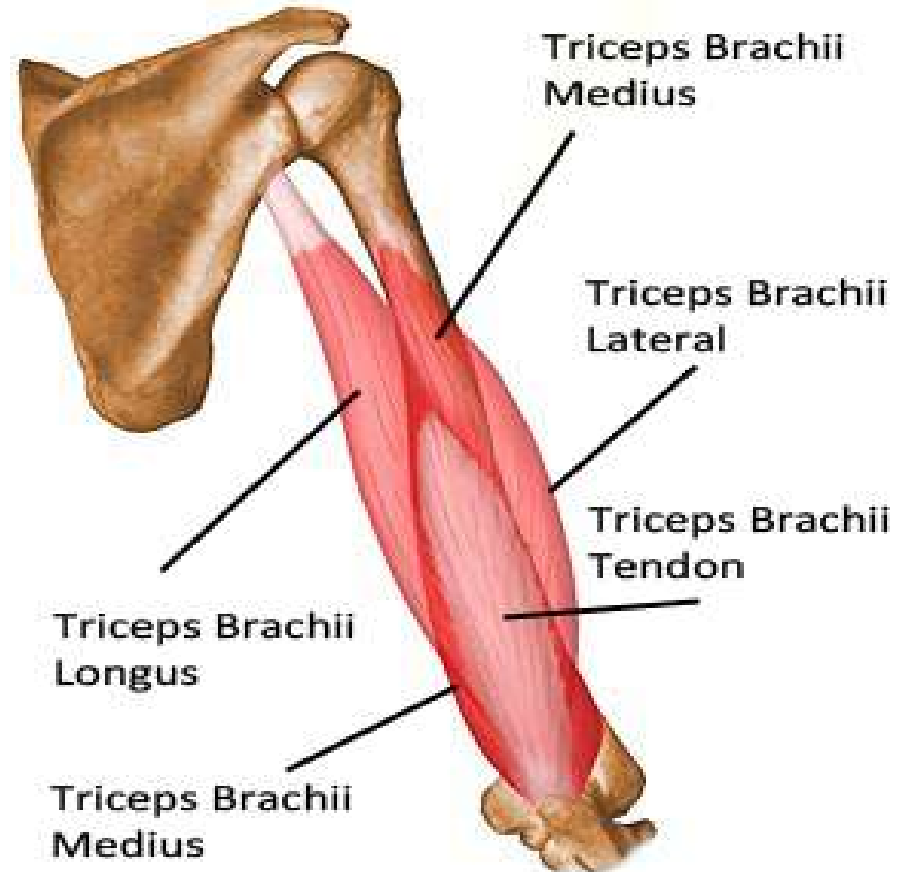
## Origin: It has 3 heads

Long head: Infraglenoid tubercle of the scapula.

Lateral head and Medial head: Posterior surface of the humeral shaft

## Insertion

Olecranon process of the ulna.





Deltoid

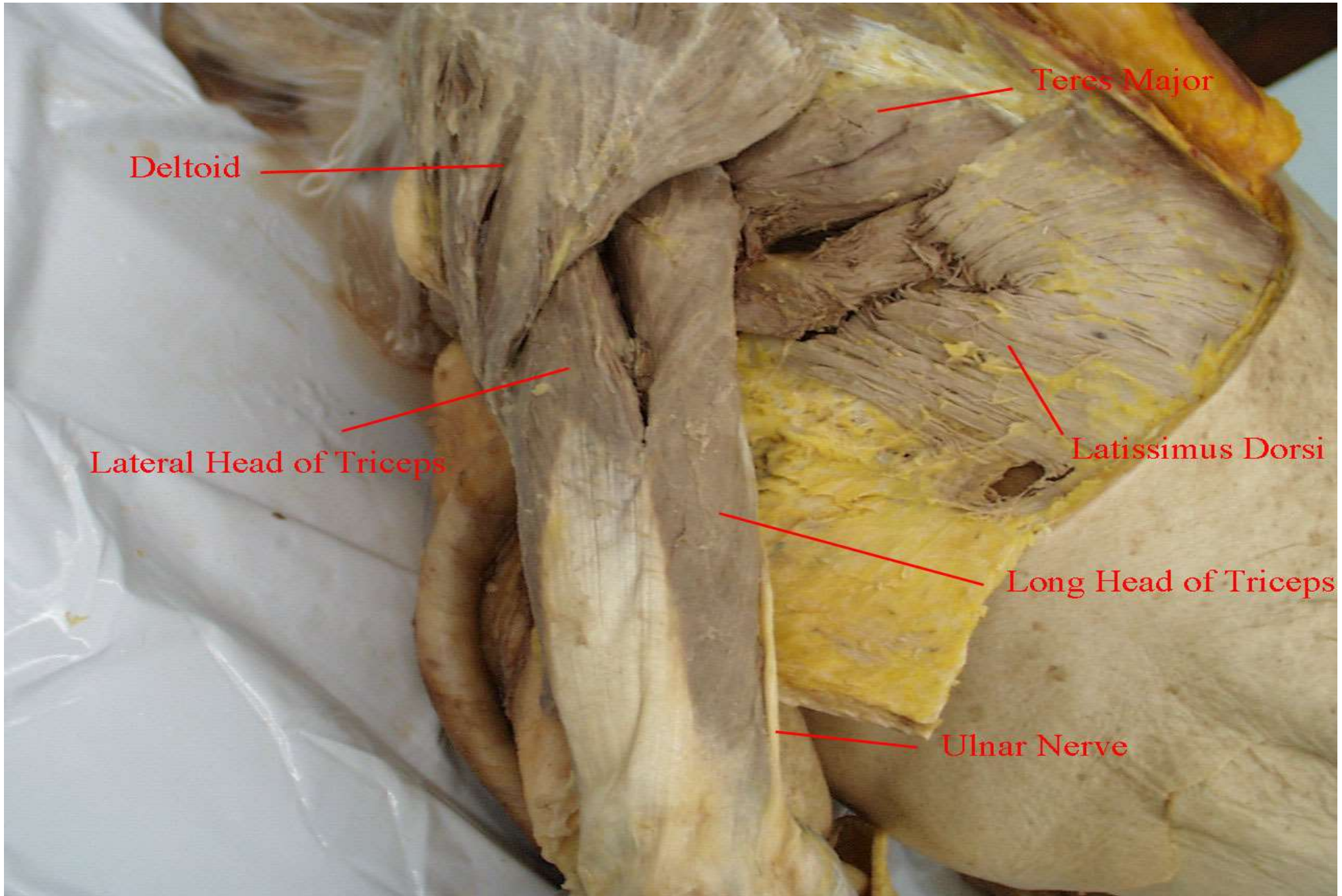
Teres Major

Lateral Head of Triceps

Latissimus Dorsi

Long Head of Triceps

Ulnar Nerve

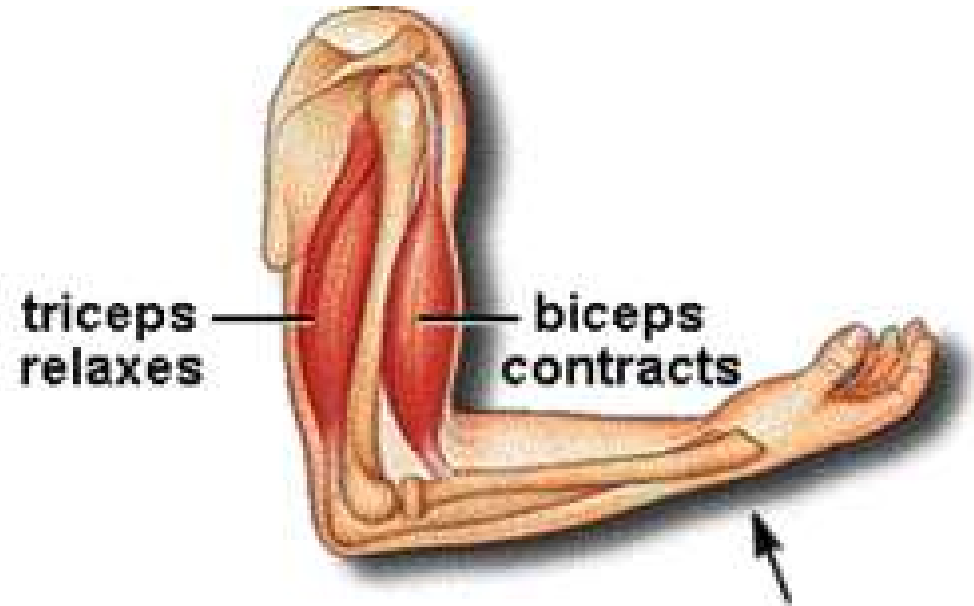
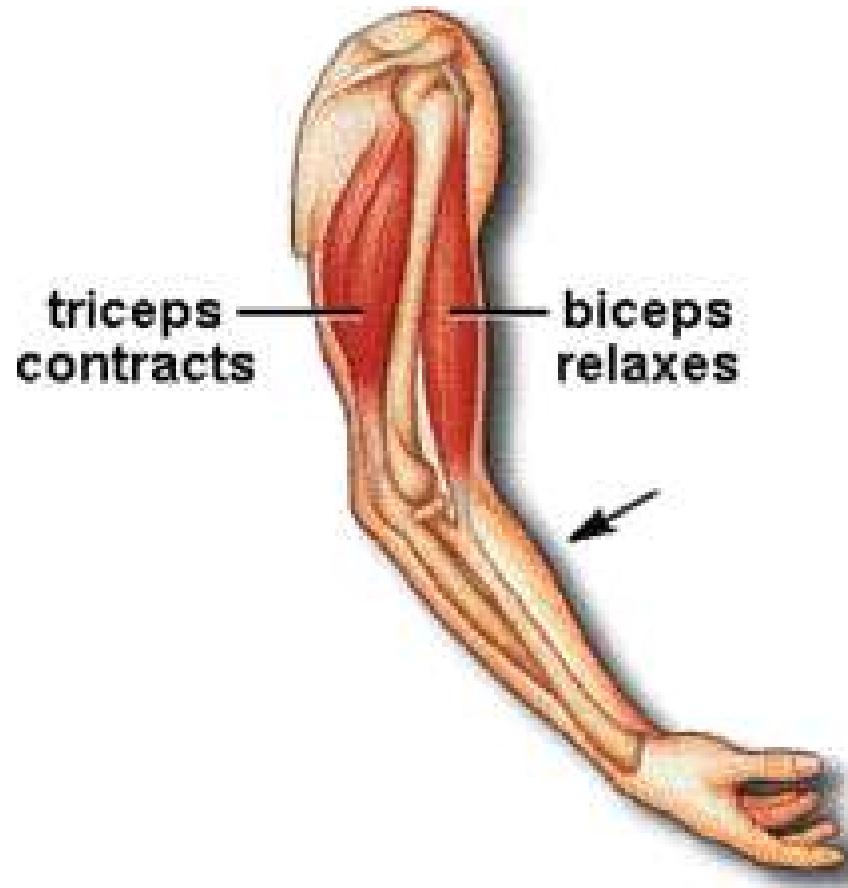


**Nerve supply:**

Radial Nerve.

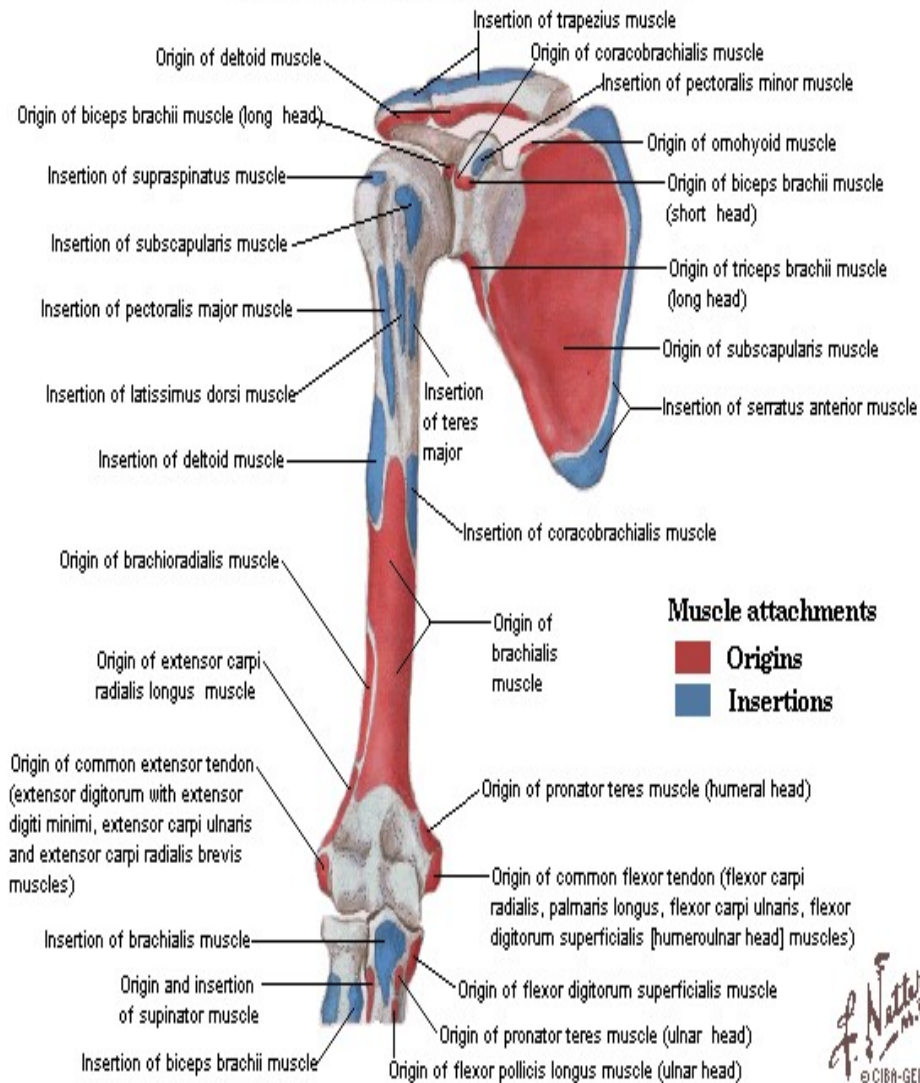
**Action:**

Main Extensor the forearm.



# Humerus and Scapula

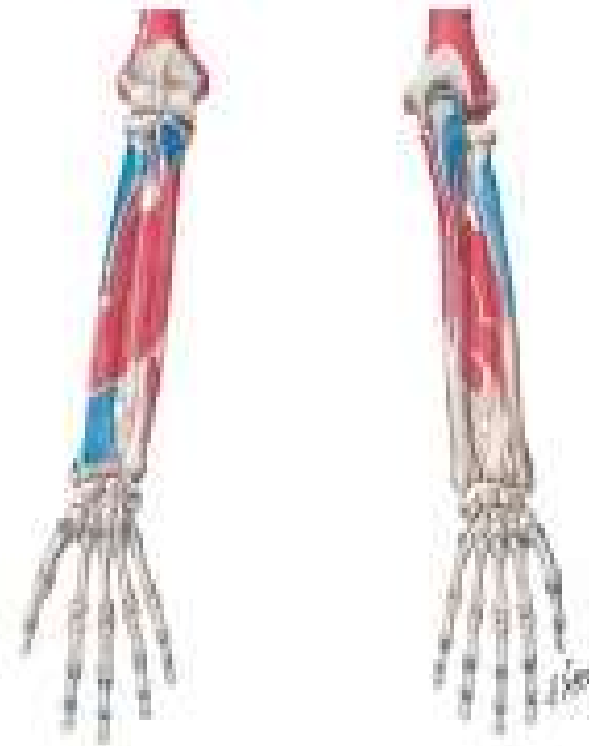
## Anterior View - Muscle Attachments



### Muscle attachments

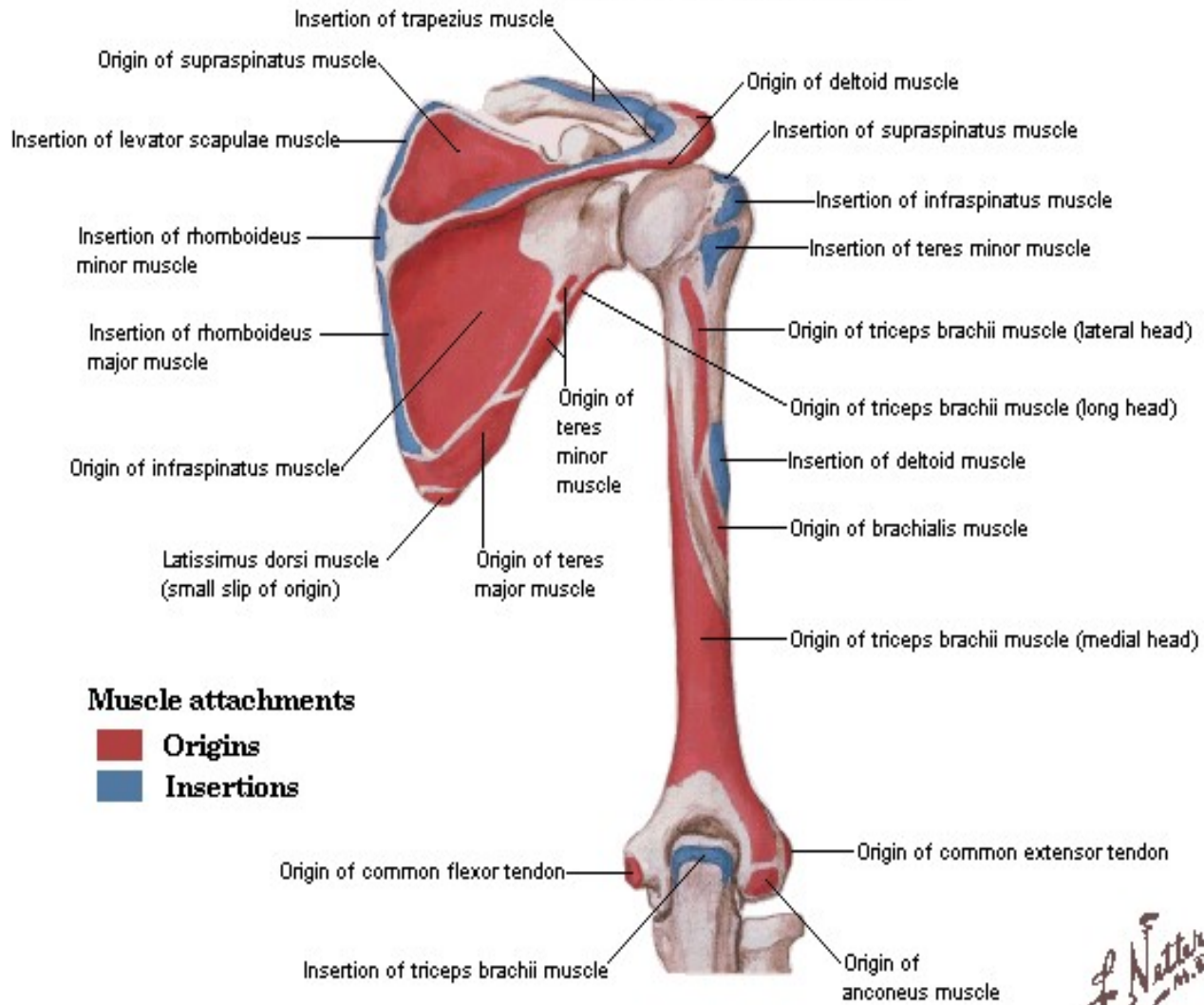
- Origins
- Insertions

*F. Netter M.D.*  
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# Humerus and Scapula

## Posterior View - Muscle Attachments



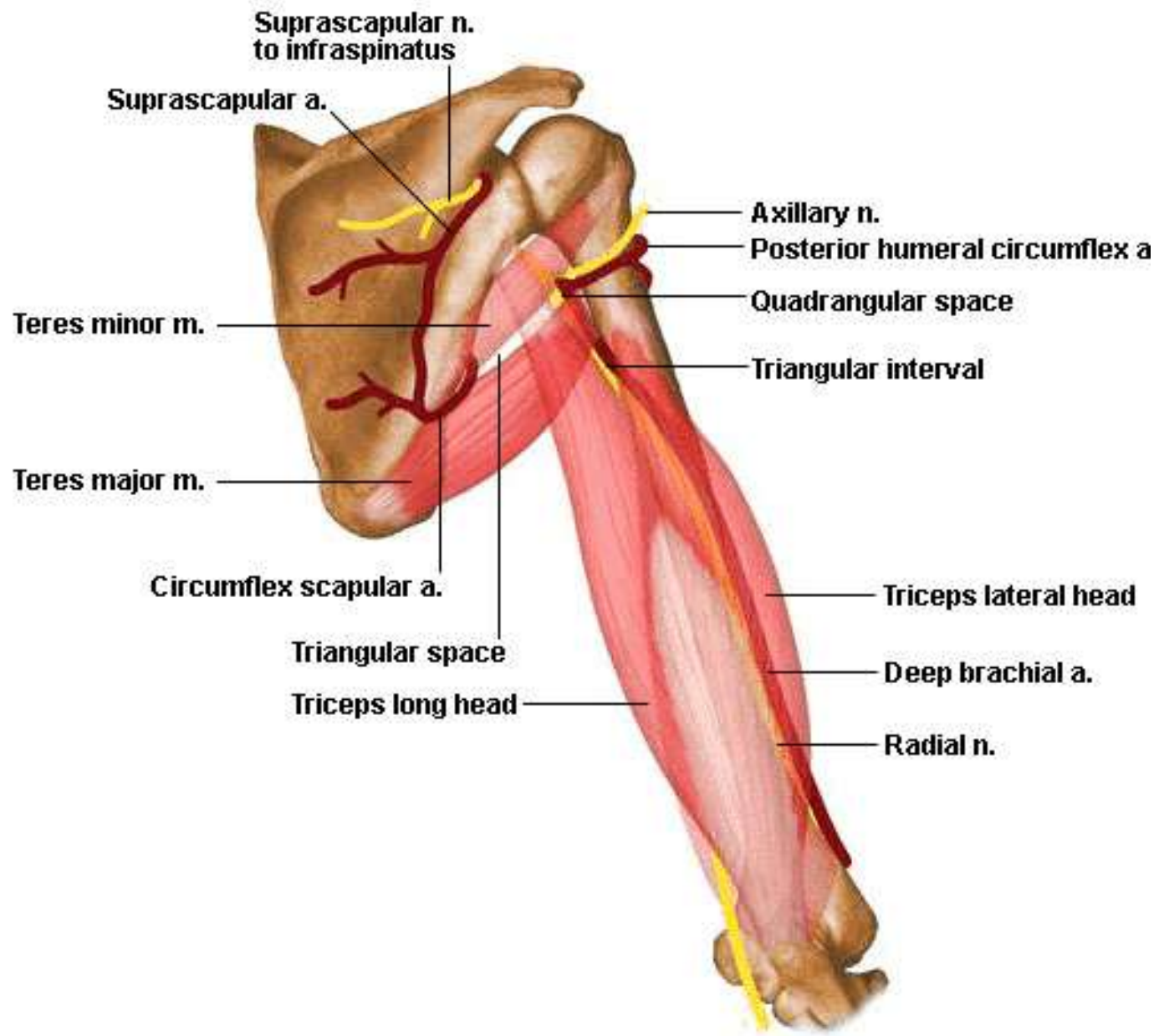
### Muscle attachments

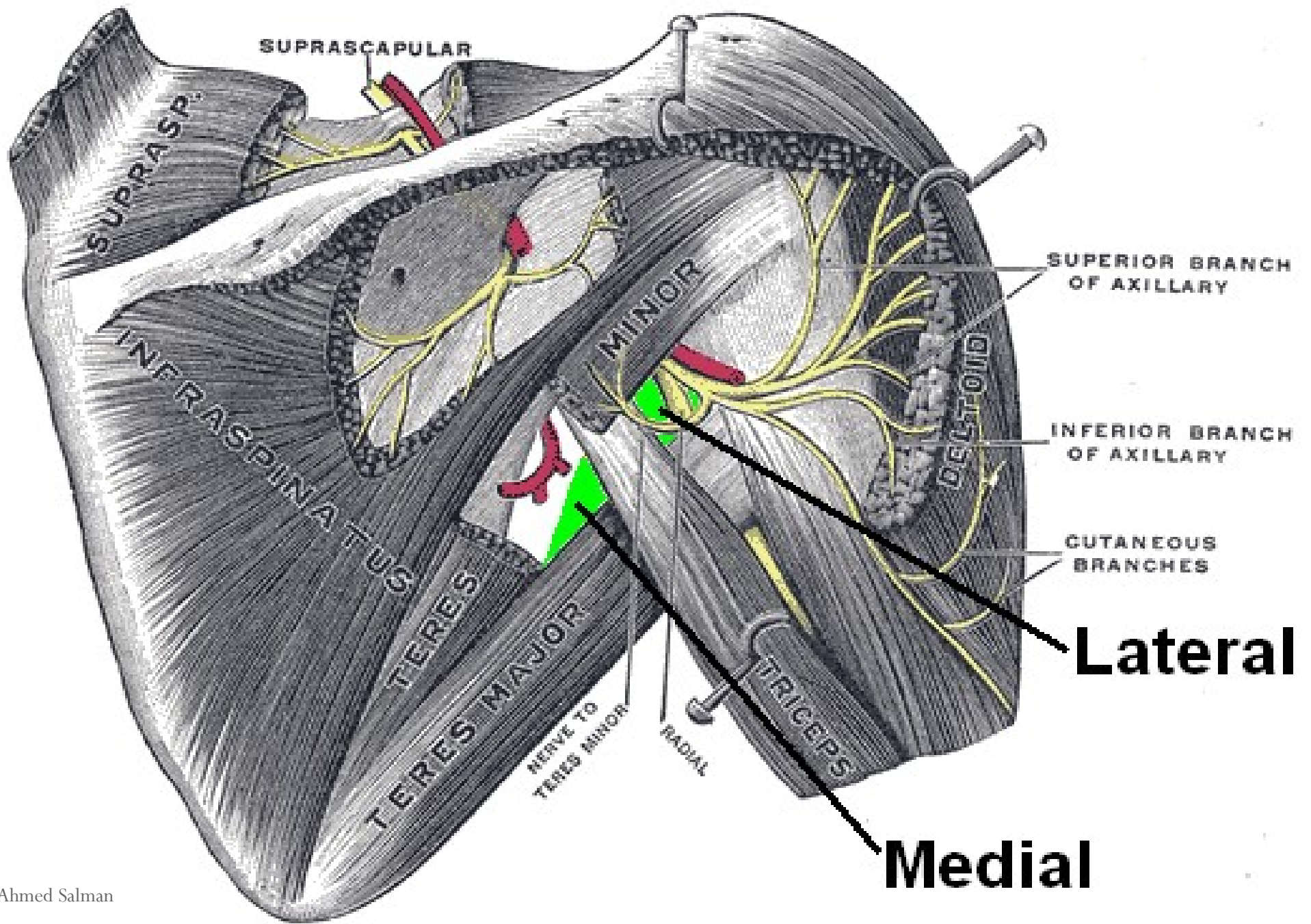
- Origins
- Insertions

*F. Natter*  
M.D.  
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# **Spaces around the shoulder**

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**Quadrangular space**

- 1-Post.circumflex humeral vessels
- 2-Axillary N

**Surgical neck of humerus**

**Lower Triangular Space**

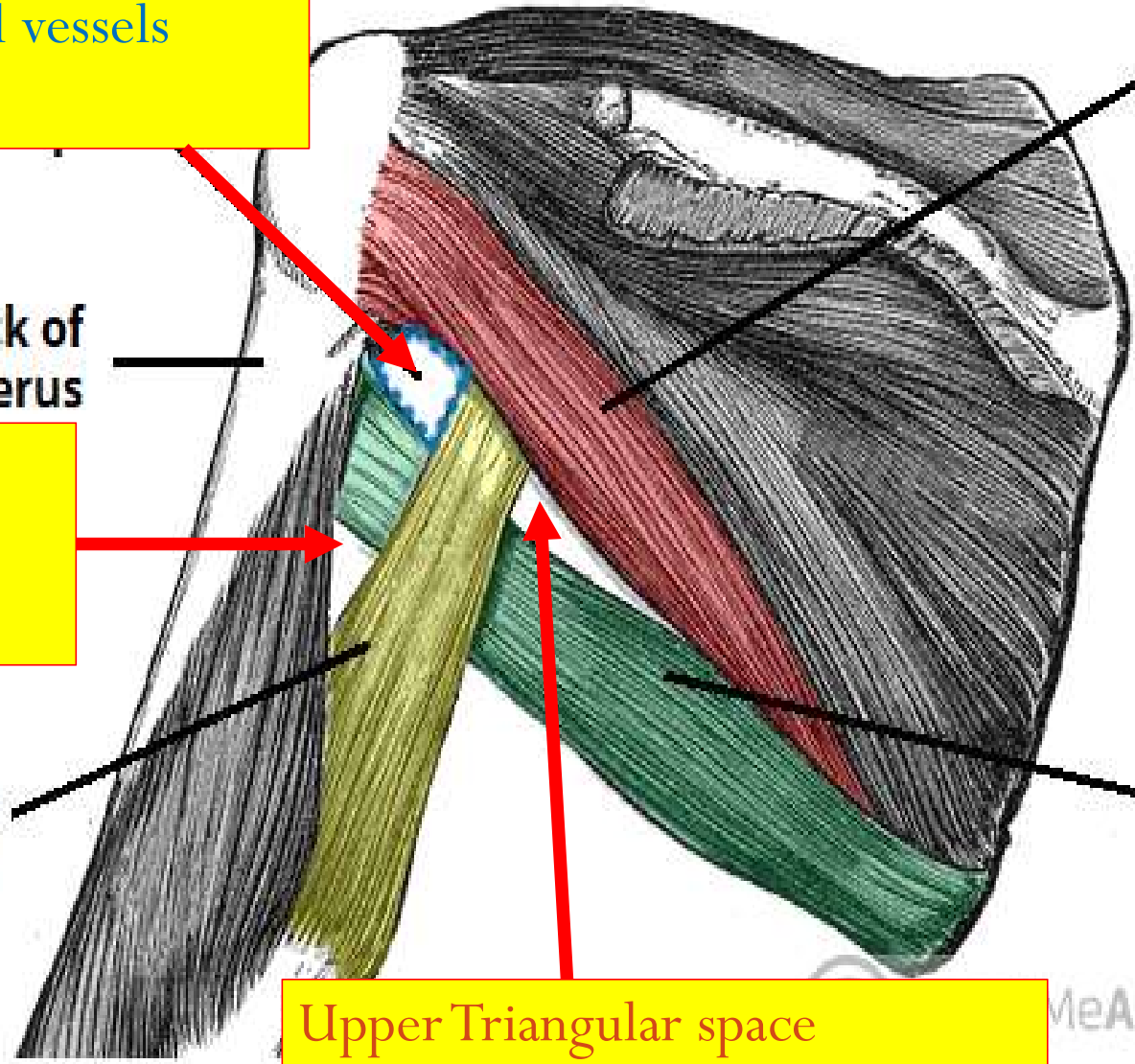
- 1-Radial Nerve
- 2-Profunda brachii Vessels

**Long head of triceps brachii**

**Teres minor**

**Teres major**

**Upper Triangular space**  
Circumflex scapular A.







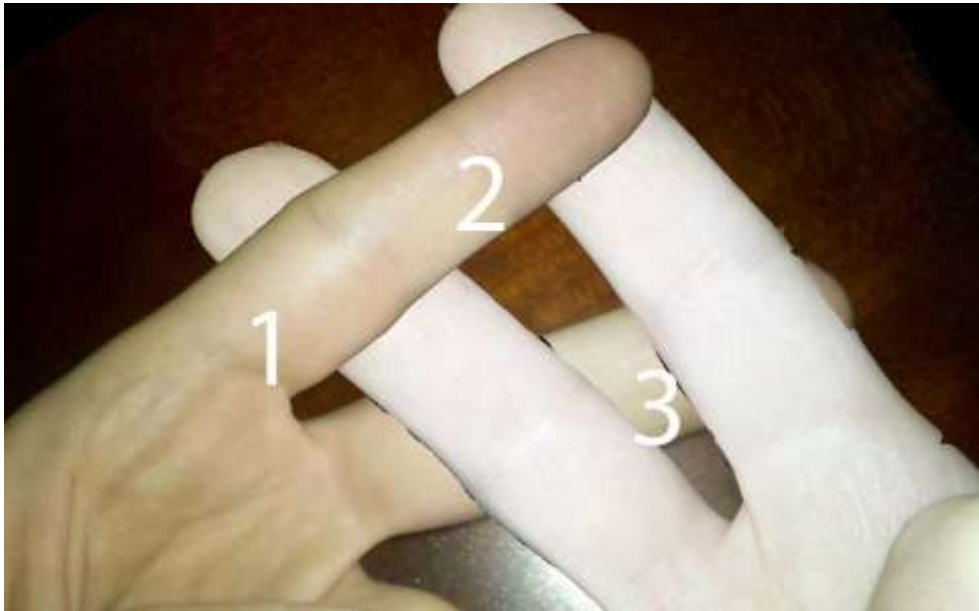
1. Teres Minor

2. Teres Major



1. Long head of Triceps

2. Humerus



**THIS PICTURE FOR**  
**LEFT SIDE**

Dr.Ahmed Salman

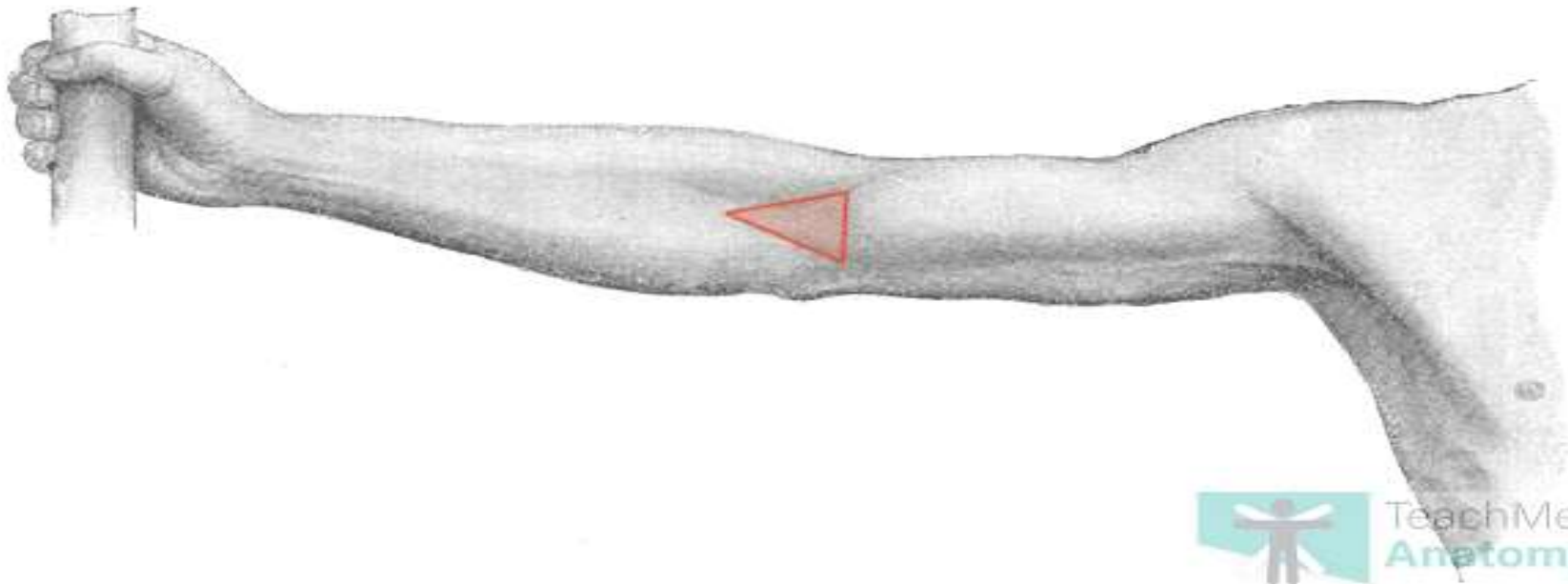
**1. Upper Triangular Space**  
Scapular circumflex artery

**2. Qudringular space**  
Axillary nerve,

Posterior circumflex humeral artery

**3. Lower Triangular space or**  
**Triangular Interval**  
Radial nerve, Profunda brachii  
artery

# Cubital fossa



The cubital fossa is a triangular area in front of the elbow joint.

**Boundaries :**

**Laterally:** brachioradialis muscle

**Medially:** pronator teres muscle

**Apex :** brachioradialis overlapping pronator teres

**Base:** an imaginary line from the medial and lateral epicondyles.

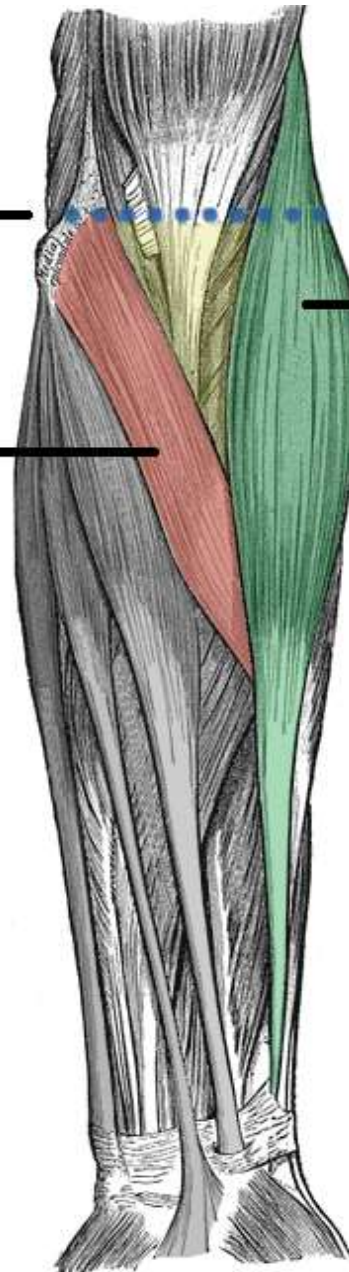
**Floor :** Brachialis medially and supinator laterally

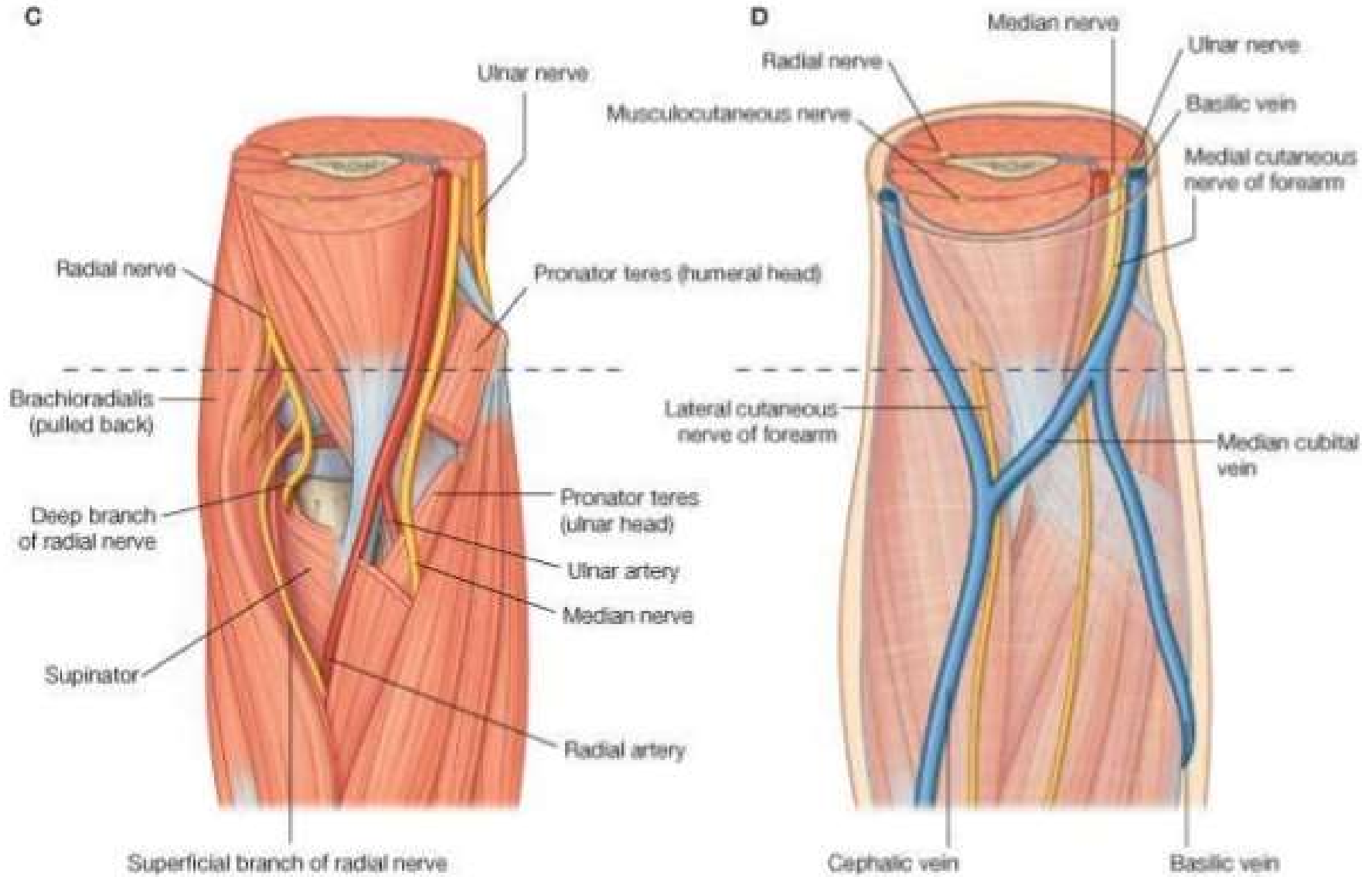
**Roof :** Skin and superficial fascia containing basilic ,cephalic and medial cubital veins

**Medial epicondyle**  
(superior border)

**Pronator teres**  
(medial border)

**Brachioradialis**  
(Lateral border)





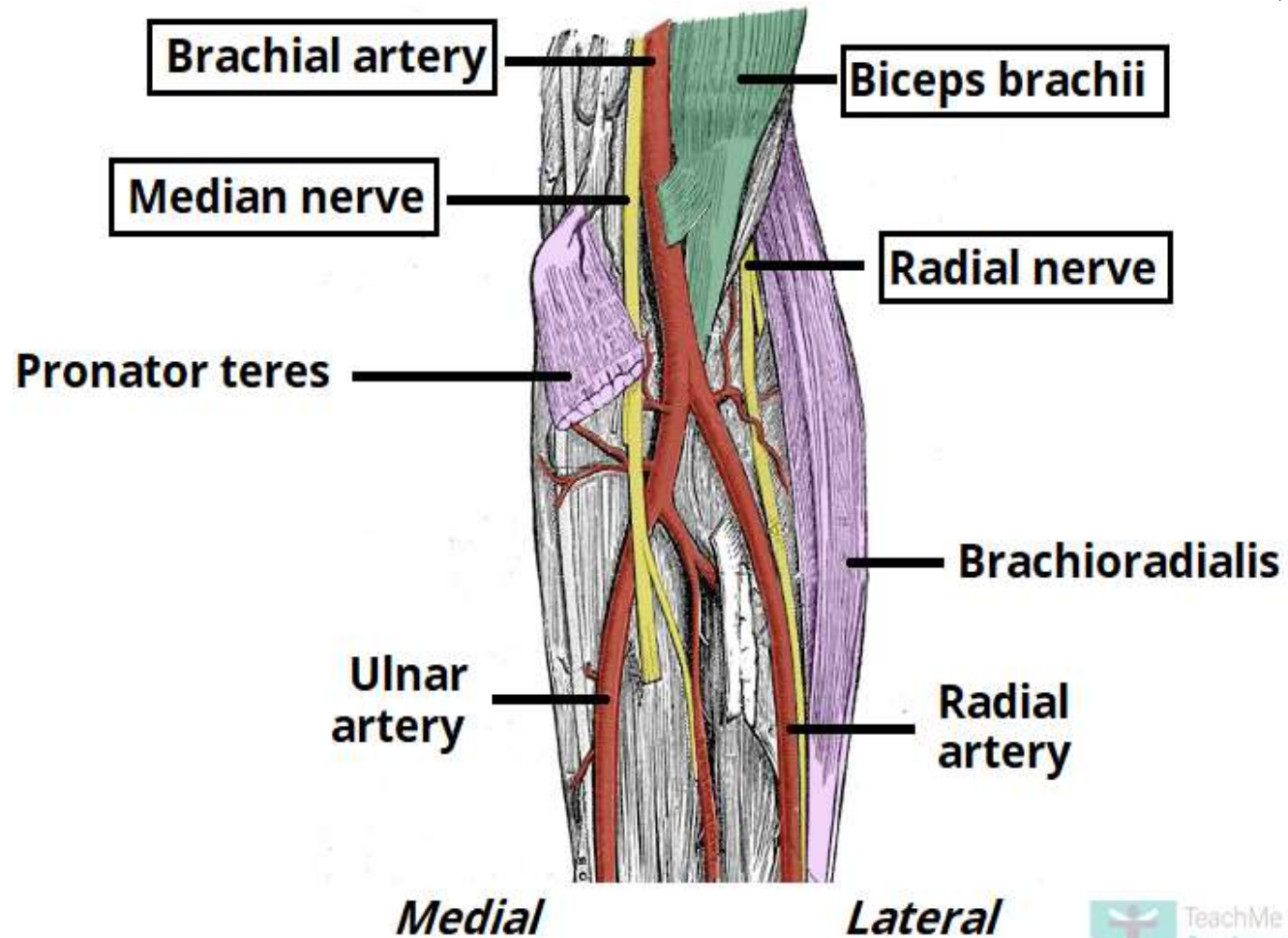
2/10/2014

Dr.Ahmed Salman

## Contents

- 1- Median nerve
- 2- Termination of brachial artery and beginning of radial and ulnar arteries
- 3- Biceps tendon
- 4- Radial nerve

### **Ulnar nerve outside the cubital fossa (WHY) ?**



## **Ulnar (cubital) tunnel**

Is a fibro-osseous space located on the posteromedial aspect of the elbow.

It transmits the **ulnar nerve** from the arm into the forearm

### **Borders (REED ONLY )**

Medial wall : medial epicondyle of the humerus.

Lateral wall : olecranon of the ulna.

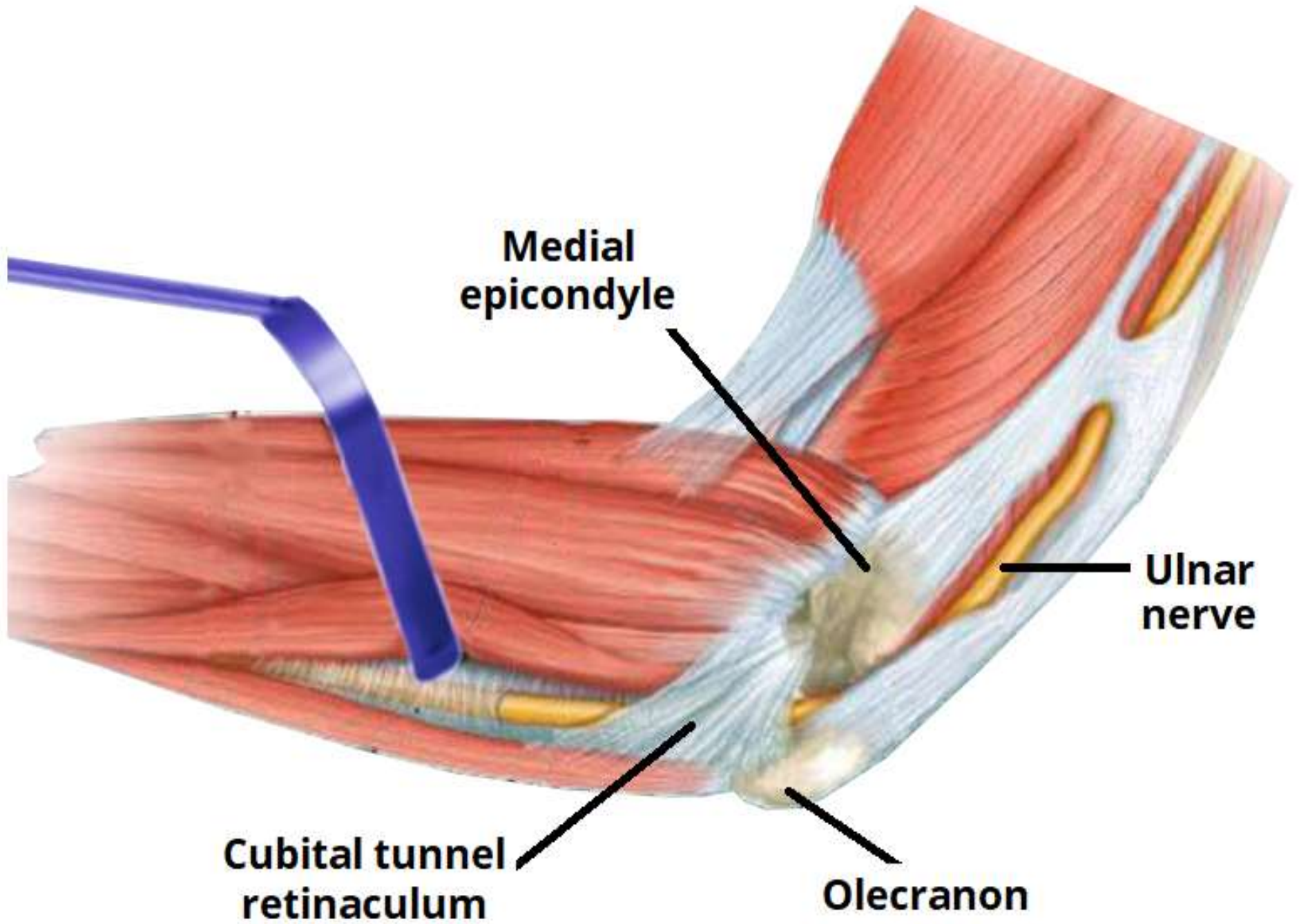
Floor : elbow joint capsule and medial collateral ligament of the elbow.

Roof : ligament spanning between the medial epicondyle and olecranon

The ligament forming the roof of the cubital tunnel is also known as the cubital tunnel retinaculum or the arcuate ligament of Osbourne.

It is a band of fascia which runs between the ulnar and humeral heads of the flexor carpi ulnaris.





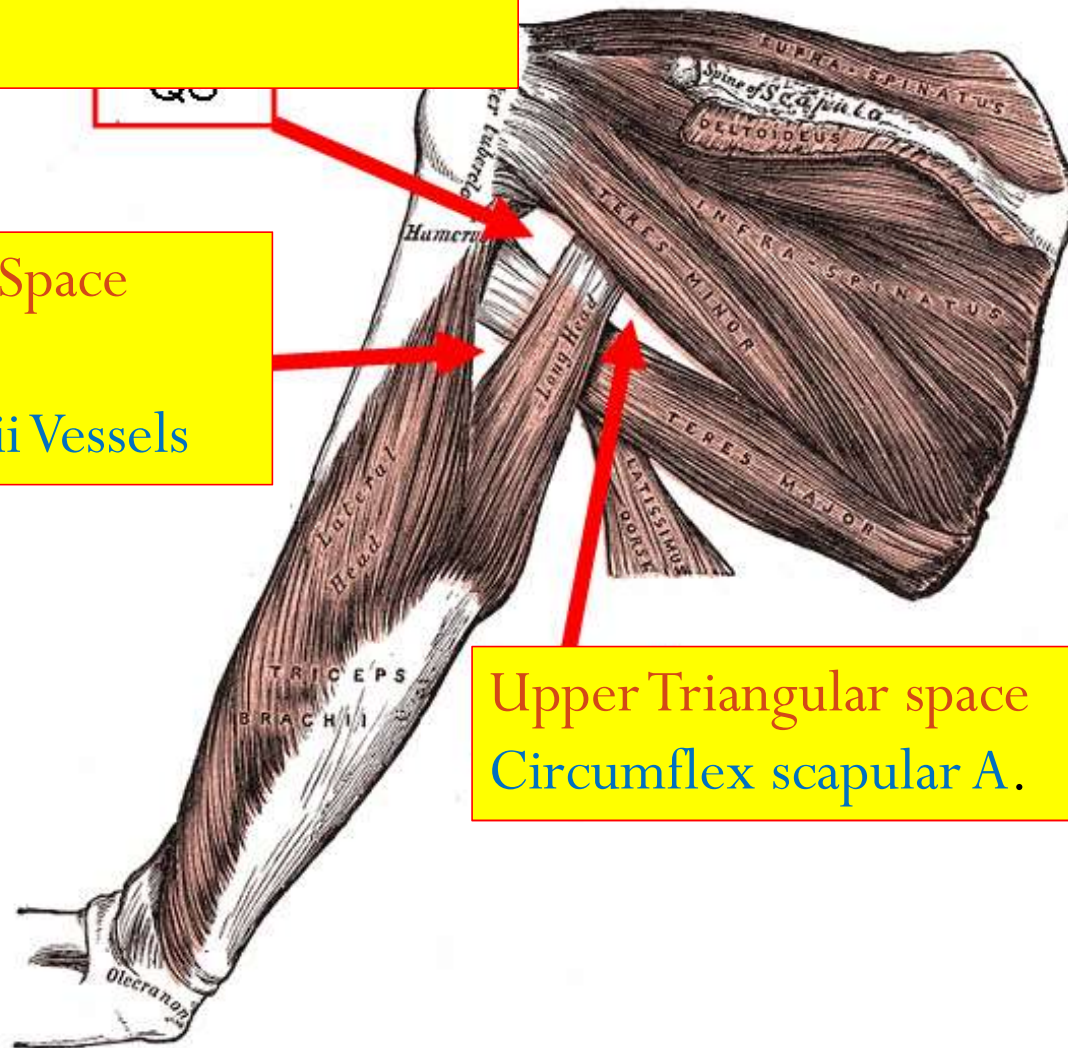
Thank  
you  
Love

## Quadrangular space

- 1-Post.circumflex humeral vessels
- 2-Axillary N

## Lower Triangular Space

- 1-Radial Nerve
- 2-Profunda brachii Vessels



## Upper Triangular space Circumflex scapular A.