

THORAX

1. Which of the following is NOT a synovial joint?
 - A. costovertebral joint
 - B. costotransverse joint
 - C. costochondral joint
 - D. interchondral joint
 - E. sternocostal joint
2. In the intercostal space,
 - A. neurovascular bundle travels between external & internal intercostal layers
 - B. 1st intercostal nerve does NOT have a cutaneous branch
 - C. anterior cutaneous branch of intercostal nerve crosses anterior to internal thoracic artery to supply the ventral strip of skin
 - D. supreme intercostal artery supplies the 1st 2 intercostal space posteriorly
 - E. there are 2 anterior intercostal arteries for each intercostal space
3. Regarding the diaphragm, the following is FALSE:
 - A. aortic opening is at the T12 level & transmits aorta, thoracic duct & azygos vein
 - B. oesophageal opening is at T10 level & transmits oesophagus, vagal trunks & oesophageal vessels
 - C. caval opening is at T8 level & transmits IVC & hemiazygos
 - D. greater, lesser & least splanchnic nerves pierce the R & L crus
 - E. L phrenic nerve pierces the dome of diaphragm.
4. Regarding diaphragm:
 - A. R & L inferior phrenic artery supply the diaphragm from its thoracic surface
 - B. Lower intercostal nerves assist phrenic nerve in motor supply of the diaphragm
 - C. Subcostal vessels pass behind the medial arcuate ligament
 - D. 55% of diaphragmatic muscles are of slow twitch variety
 - E. All of the above are true
5. At the level of lower border of T4:
 - A. trachea bifurcates into L & R main bronchus
 - B. azygos vein enters SVC
 - C. thoracic duct lies to the L of oesophagus
 - D. L recurrent laryngeal nerve hooks around the ligamentum arteriosum
 - E. all of the above
6. In the superior mediastinum:
 - A. oesophagus & trachea lie to the right of midline
 - B. aorta arches over the R main bronchus
 - C. aorta gives off L subclavian, L common carotid & brachiocephalic branch at its convexity
 - D. L lung apex is in contact with the trachea
 - E. R brachiocephalic vein has longer course than the L brachiocephalic vein.

7. Regarding trachea:
- cricoid cartilage lies at the level of C6
 - azygos vein arches over the L main bronchus
 - L recurrent laryngeal nerve travels anterior to trachea throughout its course in the superior mediastinum
 - Both R & L pulmonary artery are found at the level of carina
 - All of the above
8. Regarding the phrenic nerve, the following is FALSE:
- it contains C3,4,5 fibers
 - medial relations include the left common carotid, subclavian artery, aortic arch & left ventricle in the mediastinum.
 - It supplies the left ½ of diaphragm including R crus
 - It travels through the caval opening with IVC
 - It crosses behind the L main bronchus
9. Regarding the oesophagus, the following is INCORRECT:
- it narrows at the level where it is crossed by the aortic arch & L main bronchus
 - blood supplies are from inferior thyroid artery, left gastric artery & aorta
 - it is not drained by the azygos system
 - lymphatic drains to deep cervical, tracheobronchial & coeliac lymph nodes
 - all of the above are false
10. Regarding the heart,
- oblique sinus is found in the area between the great arteries & pulmonary veins
 - inferior border consists of right ventricle & apex of left ventricles
 - visceral pericardium is supplied by the phrenic nerve
 - R & L auricles have smooth inner surface.
 - All of the above are true
11. Which of the following is NOT seen on the posterior surface of the heart?
- L atrium
 - R atrium
 - L ventricle
 - R ventricle
 - Coronary sinus
12. Regarding the heart,
- R coronary artery lies in the R atrio-ventricular groove
 - R branch of conducting bundle lies within the septomarginal trabecula
 - Posterior cusp is the smallest cusp in the tricuspid valve
 - L ventricular wall is 3x thicker than the R ventricular wall
 - All of the above

13. Regarding the R coronary artery, the following is FALSE:
- A. RCA supplies the sino-atrial node in 60% cases
 - B. RCA gives posterior interventricular branch in 90% cases (R dominant)
 - C. AV node & conducting bundle is supplied by the RCA entirely in 90% cases
 - D. Anastomosis with LCA in atrio-ventricular groove occurs at arteriolar level only
 - E. All of the above
14. Tributaries of L brachio-cephalic veins include:
- A. thoracic duct
 - B. vertebral veins
 - C. inferior thyroid vein
 - D. internal thoracic vein
 - E. all of the above
15. Regarding the pleura:
- A. visceral pleura is supplied by the phrenic nerve
 - B. pleural aspiration should be taken at the 4th intercostal space in mid-axillary line
 - C. lowest extent of the pleura reaches the T10 level
 - D. pulmonary ligament attaches the lung hila posteriorly
 - E. all of the above are true
16. Regarding pleural markings:
- A. Both sides crosses sternoclavicular joint
 - B. Both sides meet at 2nd rib level behind the sternum
 - C. Both sides crosses mid-clavicular line at 8th intercostal space
 - D. Both sides crosses mid-axillary line at the 10th intercostal space
 - E. All of the above are true
17. Regarding the lung hilum:
- A. Pulmonary artery is more anteriorly placed than the pulmonary veins
 - B. L main bronchi gives off left upper lobe bronchi at the hila
 - C. 3 pulmonary veins are seen at the L lung hila
 - D. R hila lies within the azygos arch concavity
 - E. All of the above
18. Regarding the lungs:
- A. oblique fissure is not complete in 50% cases
 - B. oblique fissure crosses the 4th rib at the mid-clavicular line
 - C. lingular lobe is divided into anterior & posterior segments
 - D. lung hila lies at the plane of Louis
 - E. Both lung surface markings crosses mid-clavicular line at 8th intercostal space

ANSWERS:

1. C
2. B
3. C
4. D
5. E
6. C
7. A
8. D
9. C
10. B
11. D
12. E
13. C
14. E
15. B
16. E
17. D
18. A

1 Regarding the muscles of the pectoral girdle

- A Trapezius is supplied by the thoracodorsal nerve
- B Pectoralis major is supplied by all five segments of the brachial plexus
- C Pectoralis minor retracts the scapula
- D Trapezius protracts the scapula
- E Subclavius is important for pectoral girdle stability

2 Regarding the breast

- A The main blood supply is from the internal thoracic artery
- B The breast lies between the 4th and 8th intercostals spaces
- C 75% of lymph drainage is to the parasternal lymph nodes
- D Direct drainage from the breast to the supraclavicular nodes is not possible
- E The lower part of the base of the breast can overlie rectus abdominis

3 The brachial artery

- A is medial to the median artery at its origin
- B runs with the ulnar nerve for its entire course
- C only supplies extensor muscles
- D supplies triceps directly
- E terminates at the level of the radial head

Q	A
1	B
2	E
3	E