Tanta university
Faculty of Medicine
Medical Biochemistry department
19/2/2022

Exam of Medical Biochemistry for Diploma Degree of Cardiology (first part)

A- Choose the correct answer:

1- The lipoprotein associated with activation of LCAT is (A) HDL (B) LDL (C) VLDL (D) IDL	2- The apolipoprotein which acts as ligand for LDL receptor is (A) B-48 (B) B-100 (C) A (D) C
3- Nascent chylomicron receives apolipoproteins C and E from (A) VLDL remnant (B) VLDL (C) LDL (D) HDL	4- Cholesterol is present in all the following Except (A) Milk (B) Fish (C) Egg white (D) Egg yolk
5- One of the following is true about type IIa hypercholesterolemia (A) It is due to lipoprotein lipase deficiency (B) Autosomal recessive disorder (C) It is due to LDL-R deficiency (D) It is due to Apo C-ll deficiency	6- In early stages of myocardial ischemia the most sensitive indicator is the measurement of the activity of (A) CPK (B) SGPT (C) SGOT (D) LDH

B- Give an account on the following:

- 1- Factors controlling blood cholesterol concentration?
- 2- Lipoprotein(a) [Lp(a)]?
- 3- Advantages and disadvantages of cardiac troponin assay?

Good luck and best wishes

الامتحان الشفوي يوم السبت الموافق 19\2\2022

الساعة الواحدة بالقسم مع الالتزام بكافة الاجراءات الاحترازية



Department of physiology Time allowed: Three hours

Total marks: 30

Physiology Diploma of Cardiology Tanta University
Faculty of Medicine
Code: CARD 8002

Date: 19/2/2022

All the questions must be answered:

- 1-Discuss: Pathophysiological changes occurring with heart failure. (10 marks)
- 2- State: Factors affecting pulse pressure. (5marks)

All the following must be answered by only one choice (15 marks)

- 1- During rest stroke volume normally equal:
 - a. 40 ml.

c. 30 ml.

b. 20 ml.

d. 80 ml.

- 2- Histotoxic hypoxia is characterized by:
 - a. Normal arterial oxygen tension and oxygen content.
 - b. Decrease arterial oxygen tension and oxygen content.
 - c. Increase arterial oxygen tension and oxygen content.
 - d. Caused by CO poisoning.
- 3- Which of the following decrease capillary permeability:
 - a. Acidosis.

c. Alkali.

b. Hypoxia.

d. Capillary dilatation.

- 4- Which of the following is function of vitamin K:
- a. Antiprothrombin.

c. Help prothrombin formation.

b. Antithrombin.

- d. Activation to factor XII.
- 5- Stimulation of nicotinic receptors induce:
 - a. Pupil constriction.
 - b. Increase catecholamine secretion.
 - c. Decrease heart rate.
 - d. Decrease cardiac contraction.
- 6- Physiological response to cold environment include:
 - a. Cutaneous vasodilataion.

c. Decrease muscle tone

b. Increase secretion of thyroxine.

d. increase aldosterone secretion.

- 7- Blood group O is characterized by:
- a. Presence of A and B agglutinogen on RBCs.
- c. Universal recipient.
- b. Absence of A and B agglutinogen on RBCs.
- d. Absence of agglutinin in plasma.

Look to back

8- Pain sensation is characterized by which of the following:

- a. Its receptors are rapidly adapted.
- b. Its receptors are moderately adapted.
- c. Its receptors are free nerve endings.
- d. Carried by dorsal column of the spinal cord.

9- Glucocorticoids could decrease blood level of:

a. Free fatty acids.

c. Esinophils.

b. Glucose.

d. RBCs.

10- Which of the following is CORRECT regarding referred pain:

- a. Could explained by dorsal root branching mechanism.
- b. Could explained by convergence facilitation mechanism.
- c. Never occur with visceral pain.
- d. Always occur with cutaneous pain.

11- Which of the following could increase heart rate:

- a. Stimulation to beta 1 adrenergic receptors.
- b. Venodilatation.
- c. Stimulation to muscarinic receptors.
- d. Stimulation to arterial baroreceptors.

12- Intrinsic mechanism of blood coagulation is initiated by:

- a. Contact with rough surface.
- c. Activation of factor X.

b. Injury to blood vessels.

d. Activation of factor VII.

13- Vasodilatation of arterioles could induce:

- a. Increase peripheral vascular resistance.
- b. Decrease venous return.
- c. Decrease central venous pressure.
- d. Decrease peripheral vascular resistance .

14- Which of the following could induce respiratory alkalosis:

a. Restrictive lung disease.

c. Hypoventilation.

b. Renal failure.

d. Hyperventilation.

15- Which of the following is CORRECT as regard blood PH:

- a. Inversely proportionate with arterial HCO₃.
- b. Directly proportionate with arterial PCO₂.
- c. Directly proportionate with arterial HCO_3 .
- d. Normally equal 7.1 for arterial blood.

Tanta University
Faculty of Medicine
Radiodiagnosis Department

21/2/2022

Time allowed: 3 hours

(List 2013)

Radiological anatomy & technology examination

Diploma & master degrees (total marks = 90)

All questions must be attempted (each question = 10 marks)

جميع الاسئلة اجبارية

- 1) Plain X-ray positions used for examination of upper three cervical vertebrae. (10 marks)
- 2) Plain X-ray oblique views of the chest. (10 marks)
- 3) Plain X-ray positions used for examination of sacroiliac joint. (10 marks)
- 4) Technique of Double contrast barium enema. (10 marks)
- 5) Radiological anatomy of upper limb venous system, imaging of a case of deep vein thrombosis. (10 marks).
- 6) Technique and contrast media of triphasic CT of liver. (10 marks)
- 7) Radiological anatomy of male urethra and technique of micturating cystourethrography. (10 marks)
- 8) Plain X-ray positions used for mammography.(10 marks)
- 9) Plain X-ray positions used for examination of the ankle joint. (10 marks)

Good Luck

امتحان العملي والشفوى يوم الاثنين الموافق 2022/2/28 الساعه الثامنه صباحا بالعياده الشامله.

Tanta University

23/2/2022

Faculty of Medicine

Time allowed: 3 hours

Radiodiagnosis Department

(List 2013)

Radiobiology & Istotopes examination == Master & Diploma degrees(45 degree)

All questions must be attempted

جميع الاسئلة اجبارية

- 1- Give an account on the response of irradiated cells. (5 marks)
- 2- Give an account on stochastic and deterministic (non- stochastic) effect. (5 marks)
- 3- Discuss acute radiation syndrome. (5 marks)
- 4- Bone scan: indication, produre and interpretation. (5 marks)
- 5- Indication, procdure and interpretation of renal scintigraphy. (5 marks)
- 6- Discuss scintigraphic anatomy of thyroid gland, type of nucleotides used in its examination & mentioned causes of non visaliized thyroid gland on thyroid scan. (10 marks)
- 7- Chracters of ideal radioactive nucleids.(2.5)
- 8- Benign non physiological FDG uptake. (2.5 marks)
- 9- Radio-isotopes imaging in pulmonary embolism (istopes used, methods, image interpretation). (5 marks)

Good Luck

Tanta University

23/2/2022

Faculty of Medicine

Time allowed: 3 hours

Radiodiagnosis Department

(List 2013)

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امتحان العملى والشقوى يوم الاثنين الموافق 2022/2/28 الساعه الثامنه صباحا بالعياده الشاملة