

Документ подписан простой электронной подписью  
 Информация о владельце:  
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**Diagnostic testing**  
**Discipline “Biochemistry”**  
**Term 4**

Curriculum	31.05.01
Specialty	General medicine
Form of education	General medicine
Designer Department	Full-time
Graduate Department	Morphology and physiology
	Internal diseases

Competence	Task	Answers	Type of complexity
GPC -5.4	<i>Indicate one correct answer</i> 1. The diversity of proteins is due to:	1). the uniqueness of the primary structure of a protein 2). the ability of radicals of amino acid residues to interact with other classes of compounds 3). the ability of proteins to give coloured reactions 4). stabilisation of the protein structure by weak non-covalent bonds 5). the property of proteins to change their conformation	low
GPC-5.4	<i>Indicate one correct answer</i> 2. Irreversible specific inhibition of an enzyme is caused by ....	1. forëmation of covalent bonds between the inhibitor and the enzyme 2. free dissociation of the inhibitor from the enzyme 3. formation of hydrogen bonds between the inhibitor and the enzyme. 4. formation of ionic bonds between the inhibitor and the enzyme 5. binding of the substrate to the active center of the enzyme.	low
GPC-5.4	<i>Indicate one correct answer</i> 3. Which organic compound has a purine ring in its structure?	1. uric acid 2. orotic acid 3. uracil 4. cytosine 5. thymine	low
GPC-5.4	<i>Indicate one correct answer</i> 4. One CTC turnover results in oxidation and decomposition to CO <sub>2</sub> and H <sub>2</sub> O	1) oxaloacetate 2) pyruvate 3) acetyl-CoA 4) lactate 5) glucose	low
GPC-5.4	<i>Indicate one correct answer</i> 5. Muscle glycogen is used exclusively as:	1) fibre reserve 2) a source of substrates for fatty acid synthesis 3) blood glucose reserve 4) "local" glucose reserve	low

		5) glucose reserve for brain cells	
GPC-5.4	<i>Indicate all correct answer</i> 6. The signs of vitamins are:	1) are used for plastic purposes 2) are not synthesised in the body 3) does not fulfil an energetic function 4) does not fulfil a plastic function 5) are an important energy substrate	average
GPC-5.4	<i>Indicate all correct answer</i> 7. The second phase (non-oxidative reactions) of the pentose phosphate pathway involves the formation of sugars that can go directly to glycolysis.	1. glyceraldehyde-3-phosphate 2. ribose-5-phosphate 3. fructose-6-phosphate 4. glucose-6-phosphate 5. xelulose-5-phosphate	average
GPC-5.4	<i>Indicate all correct answer</i> 8. The transport form of cholesterol are:	1) very low density lipoproteins 2) chylomicrons 3) low density lipoproteins 4) intermediate density lipoproteins 5) high density lipoproteins	average
GPC-5.4	<i>Indicate all correct answer</i> 9. Ketone bodies include:	1) acetone 2) acetyl-CoA 3) acetoacetyl-CoA 4) hydroxybutyrate 5) acetoacetate	average
GPC-5.4	<i>Indicate all correct answer</i> 10. Ammonia is formed during:	1) creatine synthesis 2) lysine decarboxylation 3) deamination of amino acids 4) reductive amination of keto acids 5). amide hydrolysis	average
GPC-5.4	<i>Indicate all correct answer</i> 11. Select items that reflect the role of methionine in metabolism.	1) is involved in the initiation of the translation process. 2) participates in gluconeogenesis 3) donor of methyl group in the synthesis of a number of compounds 4) donor of acetyl group in the neutralisation of hormones and drugs. 5) a source of sulphur in the synthesis of adrenaline.	average
GPC-5.4	<i>Indicate all correct answer</i> 12. Choose the answers that reflect the role of the liver in carbohydrate metabolism.	1) the liver produces enzymes necessary for the digestion of polysaccharides 2) participates in maintaining blood glucose homeostasis 3) produces hormones that regulate blood glucose concentrations 4) glycogen is synthesised in liver cells 5) the liver synthesises glucose from non-carbohydrate substrates through gluconeogenesis.	average

GPC-5.4	<i>Indicate all correct answer</i> 13. Specify the physiological anticoagulants	1) thromboxane 2) prostacyclin 3) heparin 4) antithrombin 3 5) thrombin	average
GPC-5.4, GPC 5.8	<i>Indicate all correct answer</i> 14. Deficiency of which vitamins can manifest anaemia	1) B12 (cobalmin) 2) B6 (pyridoxine) 3) Bs (folic acid) 4) PP (nicotinic acid) 5) H (biotin)	average
GPC-5.4	<i>Indicate all correct answer</i> 15. Vasopressin is secreted in response to signals from the	1) volumoreceptors 2) thermoreceptors 3) mechanoreceptors 4) osmoreceptors 5) proprioreceptors	average
GPC-5.4	<i>Indicate all correct answer</i> 16. The functions of plasma albumin are as follows	1) maintenance of oncotic pressure of blood 2) bilirubin transport 3) blood coagulation 4) transport of steroid hormones 5) regulation of the blood-brain barrier	high
GPC-5.4	<i>Indicate all correct answer</i> 17. The following amino acids are required for the synthesis of the purine nitrogen ring:	1. glutamate 2. glutamine 3. aspartate 4. glycine 5. tyrosine	high
GPC-5.4 GPC 5.8	<i>Finish the sentence</i> 18. Ketoacidosis is		high
GPC-5.4 GPC-5.8	<i>Select the correct combination of answers</i> 19. Detoxification of bilirubin involves a) hydroxylation b) glucuronidation c) acetylation d) sulphation	1) a,b 2) a,c 3) a,d 4) a,c,d	high
GPC-5.4, GPC 5.8	<i>Finish the sentence</i> 20. The detoxifying function of the transformation reaction liver (phase 1) is to give the hydrophobic xenobiotic molecule ...		high