


Name:			
Enrolment No:			
UPES End Semester Examination, May 2023			
Course: Human Anatomy & Physiology-II Semester: 2 Program: BSC-FN&D-II, BSC-Microbiology-II, Int BMSC-Microbiology-II, Int BMSC-N&D-II, Int BMSC-Clinical Research -II, BSC- Clinical Research -II Duration: 3 Hours Course Code: HSCC1007 Max. Marks: 100			
Instructions:			
S. No.	Section A Short answer questions/ MCQ/T&F (20Qx1.5M= 30 Marks)	Marks	COs
Q 1	How are involuntary actions controlled by the brain?	1.5	CO-1
Q 2	What is a action potential?	1.5	CO-1
Q 3	What are the properties of synapse?	1.5	CO-1
Q 4	What are the enzymes present in pancreatic juice?	1.5	CO-2
Q 5	why does hydrolytic enzymes act in low pH?	1.5	CO-2
Q 6	What are various functions and part of respiratory system.	1.5	CO-3
Q 7	Name five conditions of the respiratory system?	1.5	CO-3
Q 8	Just posterior to the symphysis pubis; hollow, collapsible sac empty=deflated balloon; full=pear shape. Name this part. i. Bladder ii. Ureters iii. External Urethral Sphincters	1.5	CO-4

	iv. Urethra		
Q 9	<p>(A) The bladder is lined with _____ epithelium. (0.5)</p> <ul style="list-style-type: none"> i. Simple columnar ii. Transitional iii. Stratified squamous iv. Simple cuboidal <p>(B) Your bladder fills as faster as you age. (0.5)</p> <ul style="list-style-type: none"> i. True ii. False <p>(C) Urine that has glucose in it usually an indicator of _____(0.5)</p> <ul style="list-style-type: none"> i. Diabetes ii. Bacterial infection iii. Kidney stones iv. Muscle atropy 	1.5	CO-4
Q 10	What are ductless glands?	1.5	CO-5
Q 11	<p>(A) Which of this statement is INCORRECT regarding the function of hormones? (0.5)</p> <ul style="list-style-type: none"> i. Reproduction and sexual differentiation ii. Maintenance of internal environment iii. Maintain body temperature iv. Development and growth <p>(B) Mark the one, which is NOT the precursor of the hormone? (0.5)</p> <ul style="list-style-type: none"> i. Amino acids ii. Cholesterol iii. Phospholipids iv. Proteins <p>(C). What is the precursor of steroid hormone? (0.5)</p> <ul style="list-style-type: none"> i. Protein ii. Cholesterol iii. Carbohydrate iv. Lipid 	1.5	CO-5

Q 12	Which hormone is decreased in the menstrual cycle causing menstruation?	1.5	CO-6
Q 13	During the formation of sperms what are the following stages that take place?	1.5	CO-6
Q 14	(A) Which of them is a fat soluble hormone? (0.5) i. Amine hormone ii. Peptide hormone iii. Thyroid hormone iv. Protein hormone (B) Name the hormone which is synthesized from histidine amino acid? (0.5) i. Histamine ii. Epinephrine iii. Norepinephrine iv. Dopamine (C) Name the gland, which releases Neurohormone. (0.5) i. Hypothalamus ii. Pituitary iii. Thyroid iv. Pancreas	1.5	CO-5
Q 15	What are the parts of the endocrine system?	1.5	CO-5
Q 16	What happens to glycogen when blood sugar drops? What is the importance of neural responses to food stimuli?	1.5	CO-2
Q 17	How do hormones regulate digestion?	1.5	CO-2
Q 18	What is the Mechanism of Peptide Hormone Action?	1.5	CO-5
Q 19	Which organ in the human body does the fertilisation process occur and what is a fertilized cell called?	1.5	CO-6
Q 20	What are important hormones present in the human body?	1.5	CO-5
<p>Section B (4Qx5M=20 Marks)</p>			
Q 1	Explain in detail the anatomy of the respiratory system with a diagram.	5	CO-3

Q 2	(A) Explain Physiology of urine formation. (2.5) (B) Explain various steps of urine formation. (2.5)	5	CO-4
Q 3	(A) Explain the various Conditions and disorders affect the endocrine system. (2.5) (B) Explain Mechanism of hormone action. (2.5)	5	CO-5
Q 4	(a) Explain the Physiology of menstruation. (b) Explain protein synthesis in reproductive system.	5	CO-6
Section C (2Qx15M=30 Marks)			
Q 1	(A) Explain Lung Volumes and capacities transport of respiratory gases. (7.5) (B) Explain five diseases related to respiratory system with various kinds of treatments for the same. (7.5)	15	CO-3
Q 2	(A) Explain Bladder Emptying and the Micturition Reflex (7.5) (B) Explain with diagram kidneys and the urinary system: parts and functions. (7.5)	15	CO-4
Section D (2Qx10M=20 Marks)			
Q 1	(A) Explain role of RAS in kidney and disorders of kidney. (5) (B) Explain Blood is filtered by the glomerulus & Kidneys and Acid–Base Balance. (5)	10	CO-4
Q 2	(A) Explain the following terms: (5) i. Ovulation ii. Luteal phase iii. Fertilization iv. Spermatogenesis	10	CO-6

	v. Prokaryotic protein synthesis (B) Explain The genetic pattern of inheritance (5)		
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