

Time: 3 Hrs.

[Max. Marks: 100]

PHYSIOLOGY - PAPER I (Revised Scheme)**QP Code: 1053**

Your answers should be specific to the questions asked.
Draw neat labeled diagrams wherever necessary.

LONG ESSAY**2 X 9 = 18 Marks**

1. Describe Nervous control of Respiration
2. What is Anaemia? Describe different types of anaemia with their physiological causes

SHORT ESSAY**10 X 5 = 50 Marks**

3. Describe mechanism of Respiration
4. Describe the mechanism of hydrochloric acid secretion in the stomach
5. Describe the regulation of gastric emptying
6. Describe the mechanism of pancreatic secretion
7. Describe the generation of impulse in sino-atrial node
8. Describe the transport of oxygen in the blood
9. What is surfactant? Give its composition and mechanism of action
10. Describe Acclimatization to low PO_2 at high altitude
11. What are the functions of kidney?
12. Explain the role of tubuloglomerular feed back in auto - regulation of GFR (Glomerular Filtration Rate)

SHORT ANSWERS**16 X 2 = 32 Marks**

13. Explain the mechanism of Phagocytosis
14. Enumerate the types of RNA and explain their functions
15. Give the functions of Helper T cell
16. What is Landsteiner's law? For which blood group system is it applicable
17. Describe Erythroblastosis fetalis (Haemolytic disease of new born)
18. Draw and label the pathway of impulse conduction in heart
19. What is Bain bridge reflex? What is its importance?
20. What is periodic breathing?
21. What is the importance of cough reflex?
22. List lung volumes and capacities
23. Give functions of gall bladder
24. Explain the role of secretin in regulation of bile secretion
25. Enumerate the peculiarities of renal circulation
26. What is obligatory urine volume?
27. Describe Juxta Glomerular apparatus. Give its importance
28. Draw and label parts of a Nephron