

PATHOLOGY**PAPER-I**Time: 3 hours
Max. Marks:100

PATHO/D/20/32/I

Important Instructions:

- **You are provided with 5 answer sheet booklets. Each individual answer sheet booklet consists of 10 pages excluding the covering jackets.**
- **Answers to all the questions must be attempted within these 5 answer sheet booklets which must be later tagged together at the end of the exam.**
- **No additional supplementary answer sheet booklet will be provided.**
- Attempt all questions in order.
- Each question carries 10 marks.
- Read the question carefully and answer to the point neatly and legibly.
- Do not leave any blank pages between two answers.
- Indicate the question number correctly for the answer in the margin space.
- Answer all the parts of a single question together.
- Start the answer to a question on a fresh page or leave adequate space between two answers.
- Draw table/diagrams/flowcharts wherever appropriate.

Write short notes on:

1. Describe the pathophysiology of hypovolemic shock. Discuss the expected autopsy findings in a case of death from hypovolemic shock due to upper GI bleed. 10
2. a) Enumerate "Pattern recognition receptors" of immune system. 5+5
b) Spectrum of autoantibodies in SLE.
3. a) Cellular and immunological interactions in atherosclerotic plaque. 5+5
b) Chemical nature of amyloid.
4. a) Regulators of angiogenesis. 5+5
b) Laboratory information system.
5. a) Significance of non-coding DNA. 5+5
b) Triple repeat disorders of coding regions.
6. a) Telomeropathies. 5+5
b) Inflammasomes.
7. a) Role of growth factors in tissue repair. 5+5
b) Pathogenesis of ascites.
8. a) Xenobiotics. 5+5
b) Pyroptosis and its role in health and disease.
9. a) Cellular Housekeeping. 5+5
b) Cyclin Dependent Kinase Inhibitors (CDKIs).
10. Pathophysiology of Covid-19. 10
