

National Board of Examinations

Question Paper Name : DrNB CRITICAL CARE MEDICINE Paper3
Subject Name : DrNB CRITICAL CARE MEDICINE Paper3
Duration : 180
Total Marks : 100
Display Marks: No

Maximum Instruction Time : 0

Question Number : 1 Question Id : 32718740534 Consider As Subjective : Yes

Please write your answers in the answer booklet within the allotted pages as follows:-

Question Number	Answer to be attempted within	Question Number	Answer to be attempted within
Q. 1	Page 1-5	Q. 6	Page 26-30
Q. 2	Page 6-10	Q. 7	Page 31-35
Q. 3	Page 11-15	Q. 8	Page 36-40
Q. 4	Page 16-20	Q. 9	Page 41-45
Q. 5	Page 21-25	Q. 10	Page 46-50

1. Discuss the role of hyperbaric oxygen therapy in critical care. What are the potential complications of this therapy? [5+5]

Question Number : 2 Question Id : 32718740535 Consider As Subjective : Yes

Based on the 2024 intensive care medicine experimental study on gut microbiome dysbiosis in critical illness, what are the pathophysiological mechanisms linking splanchnic hypoperfusion to systemic inflammation and multi-organ dysfunction? [10]

Question Number : 3 Question Id : 32718740536 Consider As Subjective : Yes

What is the role of electrical impedance tomography (EIT) and oesophageal pressure monitoring in optimising mechanical ventilation? [5+5]

Question Number : 4 Question Id : 32718740537 Consider As Subjective : Yes

In the 2024 intensive care medicine review on diagnosing cardiogenic shock, what are the key echocardiographic parameters and biomarkers recommended for rapid and accurate diagnosis in the ICU setting? [5+5]

Question Number : 5 Question Id : 32718740538 Consider As Subjective : Yes

- a) Describe the hemodynamic changes encountered in a "potential brain dead donor". [5]
- b) Discuss the significance of hormone replacement in "potential brain dead donor". [5]

Question Number : 6 Question Id : 32718740539 Consider As Subjective : Yes

Describe the pathophysiology, severity grading and management of hepatopulmonary syndrome in a case of decompensated liver disease in the ICU. [4+3+3]

Question Number : 7 Question Id : 32718740540 Consider As Subjective : Yes

- a) Discuss the principles of cardiac output monitoring. [7]
- b) Role of passive leg raise test in ICU. [3]

Question Number : 8 Question Id : 32718740541 Consider As Subjective : Yes

According to the 2025 American journal of respiratory and critical care medicine update on the diagnosis and management of community-acquired pneumonia, what are the key management strategies for critically ill patients requiring ICU admission? [10]

Question Number : 9 Question Id : 32718740542 Consider As Subjective : Yes

What ethical challenges do Indian ICU clinicians face when conducting clinical research involving critically ill patients, especially in ensuring voluntary participation and informed consent in a diverse, multilingual population? [10]

Question Number : 10 Question Id : 32718740543 Consider As Subjective : Yes

In the 2024 Critical care medicine review on neuromonitoring in acute stroke patients, what are the updated recommendations for using transcranial doppler and intracranial pressure monitoring to guide ICU management of cerebral oedema? [5+5]