

**DIPLOMA IN ANAESTHESIOLOGY (DA) EXAMINATION**

**APPLIED BASIC SCIENCES RELATED TO ANAESTHESIA,  
HISTORY OF ANAESTHESIA AND PHYSICS IN ANAESTHESIA**

*Q.P. Code: 343030*

**Time: Three Hours**

**Maximum: 100 Marks**

**I. Elaborate on:**

**(2 x 15 = 30)**

1. Explain in detail the physiology of oxygen transport in the body.
2. Describe in detail the anatomy and physiology of cerebral circulation and factors affecting the autoregulation of cerebral blood flow.

**II. Write notes on:**

**(10 x 7 = 70)**

1. John Snow.
2. Venturi principle.
3. Draw a diagram and explain a typical spinal nerve.
4. Determinants of cardiac output.
5. Context sensitive half time.
6. End tidal carbondioxide.
7. Opiod receptors.
8. Hypoxic pulmonary vasoconstriction.
9. Peak expiratory Flow rate.
10. Ethylene oxide (ETO).

\*\*\*\*\*