

THE TAMIL NADU DR. M.G.R. MEDICAL UNIVERSITY

[DM 0823]

AUGUST 2023

Sub. Code :1451

D.M. – NEONATOLOGY

**PAPER I – APPLIED BASIC SCIENCES AS APPLIED TO NEONATOLOGY
AND PERINATOLOGY; RESEARCH METHODS**

Q.P. Code: 161451

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on: **(2 x 15 = 30)**

1. Elaborate on the grade system of grading evidence and recommendations. What do you mean by ‘Strength of Recommendation’ and ‘Quality of Evidence’?
2. Elaborate the steps of Thyroxin Synthesis and conditions causing Congenital Hypothyroidism.

II. Write notes on: **(10 x 7 = 70)**

1. Pathophysiology of Periventricular Leucomalacia.
2. Medication error in Neonatal Practice and its prevention.
3. PDSA cycle in Quality Improvement.
4. Gut Microbiome.
5. Survival Analysis.
6. Forest Plot.
7. Regulation of Phosphorus Homeostasis in a Neonate.
8. Ethical Issues in Neonatal Resuscitation.
9. Mechanism of Placental Transport.
10. Research Priorities in Newborn Health.
