

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

[AHS 0122]

**JANUARY 2022
(OCTOBER 2021 EXAM SESSION)**

Sub. Code: 2316

**M.Sc. NUCLEAR MEDICINE TECHNOLOGY
SECOND YEAR (From 2019-2020 onwards)
PAPER VI - HEALTH PHYSICS AND & RADIATION PROTECTION
*Q.P. Code : 282316***

Time: Three hours

Answer ALL Questions

Maximum: 100 Marks

I. Elaborate notes on:

(2 x 20 = 40)

1. Explain in detail about the
 - a) Duties of NM Technologist
 - b) Responsibilities of RSO
 - c) Responsibilities of licensee
2. Explain in detail about the
 - a) Radioactive waste management in NM lab
 - b) Emergency preparedness in nuclear medicine

II. Write Short Notes on:

(10x6 = 60)

1. Committed Dose.
2. Dose reciprocity theorem.
3. MIRD.
4. Management of Radiation injuries.
5. Decontamination procedure.
6. Sterilization methods.
7. Principle of Asepsis.
8. Misadministration of I131 10mCi radiopharmaceutical to a patient – Management.
9. AERB recommended dose limits for radiation worker & public.
10. Transport index of a radiopharmaceutical.
