

[LB 1514]

OCTOBER 2012

Sub. Code: 3019

DIPLOMA IN MEDICAL RADIODIAGNOSIS (DMRD)
EXAMINATION
MEDICAL RADIATION PHYSICS AS APPLIED TO RADIODIAGNOSIS
Q.P. Code: 343019

Time: 3 hours
(180 Min)

Maximum: 100 marks

Answer ALL questions in the same order.

I. Elaborate on :

		Pages	Time	Marks
		(Max.)	(Max.)	(Max.)
1. Describe in detail the interaction of X-rays with Matter.	16	35	15	
2. Describe in detail the principles of Multi detector CT.	16	35	15	

II. Write notes on:

1. Processing Steps in Computed Radiography.	4	10	7
2. Composition and functions of Developer and Fixer	4	10	7
3. Methods used to detect Radiation Dose.	4	10	7
4. Different Gradient Sequences used in MRI.	4	10	7
5. Application of Air gap Technique in Radiography.	4	10	7
6. Causes and types of Fog in Radiography	4	10	7
7. Definition, sources and types of Artefacts in MRI.	4	10	7
8. Design and Operation of Single Photon Emission	4	10	7
Computed Tomography			
9. Basic Doppler systems used in Doppler Sonography	4	10	7
10. Radio isotopes used in Thyroid Scanning.	4	10	7