C 48683		(Pages:2)		Name
				Reg. No
FΩ	HIDTH SEMESTED M	I Sa DECREE	EYAMINIAT	
FOURTH SEMESTER M.Sc. DEGREE EXAMINATION, SEPTEMBER 2008				
	om GENERALGE	Microbi		RIOFTHICS AND IPR
MB 4 2T—GENETIC ENGINEERING, BIOSAFETY, BIOETHICS AND IPR				
(2005 Admissions)  Maximum: 80 Marks				
Time: Three Hours  Section A				
		Answer any <b>two</b> Each question c		
Write b	oriefly on:			
1.	Blotting technique.			
2.	Abundancy probing.			
3.	BACS.			
4.	RACE.			
5.	Codon optimization.			
6.	Inverse PCR.			
7.	Leuciferase assay.			
8.	Biolistics.			
9.	RNA interference.			
10.	Nucleic acid microarrays.			
11.	Therapeutic cloning.			
12.	TRIPS.			
13.	Colony hybridization.			
14.	Autoradiography.			
15.	Plasmid.			
16.	cDNA libraries.			
17.	Gene technology act.			
18.	GATT.			
19.	UPOV convention.	1.50		
20.	Policy on the storage of G	MOs.		
21.	Premers.			

 $(20 \times 2 = 40 \text{ marks})$ 

Turn over

22. Chemical method of DNA sequencing.

2 C 48683

## Section B

Answer any five questions. Each question carries 8 marks.

- 1. Protein Engineering.
- 2. Different types of probes.
- 3. Expression strategies for heterologous genes.
- 4. Bioethics and Embryo research.
- 5. Patent and IPR.
- 6. Controversy regarding patented research tools
- 7. Role of FDA, VSDA and EPA in the Biosafety of GMOs.

(5 x 8 <sup>/210</sup> vs