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# DRR-3234

## B. Sc. (Microbiology) (Sem. VI) Examination

### March / April - 2016

### MB-19 : Economic Microbiology

Time : **2** Hours] [Total Marks : **50**

Instructions :

(1)

નીચે દર્શાવેલ ☛ નિશાનીવાળી વિગતો ઉત્તરવહી પર અવશ્ય લખવી.
**Fillup strictly the details of ☛ signs on your answer book.**

Name of the Examination :

☛ **B. SC. (MICROBIOLOGY) (SEM. VI)**

Name of the Subject :

☛ **MB-19 : ECONOMIC MICROBIOLOGY**

☛ Subject Code No. : **3 2 3 4** ☛ Section No. (1, 2,.....) : **Nil**

Seat No. :

Student's Signature

(2) Figures to the right side indicate full marks of the question.

(3) Draw neat and labelled diagrams whenever necessary.

**1** Give specific answers : **12**

(1) Enlist the different carbon sources used in glutamic acid production.

(2) Name the microorganisms used to produce Glucoamylases.

(3) What is Bacterization?

(4) What do you mean by CRYEMA? Where it is used?

(5) What is 'Gasohol'? What is drawback of it?

(6) Write about the composition of biogas.

**2** Explain / Justify any **two** of the following : **12**

(1) Increased permeability in glutamic acid producing bacteria can be attained in several different ways.

(2) Write on the commercial processes for microbial leaching.

(3) Write detail account on phosphate biofertilizers.

3 Attempt any **two** of the following: **16**

(1) Explain *Rhizobium* inoculants in detail.

(2) Describe bioremediation of heavy metals.

(3) Discuss alcohol as a liquid fuel in detail.

4 Write short notes on any **two** of the following: **10**

(1) Production processes of Acetone/Butanol fermentation.

(2) Different feed stocks used in Biogas production.

(3) Intrinsic bioremediation *Vs* Engineered In-situ bioremediation.

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