

Shree Manibhai Virani and Smt. Navalben Virani Science College (Autonomous)

Affiliated to Saurashtra University, Rajkot

SEMESTER END EXAMINATION APRIL – 2017

M.Sc. Microbiology / M.Sc. Biotechnology

16PMBDC04/ 16PBTDC04 – FOOD AND DAIRY TECHNOLOGY

Duration of Exam – 3 hrs

Semester – II

Max. Marks – 70

Part A (5x2= 10 marks)

Answer **ALL** questions

1. Define the function of FDA
2. Give an example of fermented vegetable and fruit.
3. Define shelf life
4. Name the milk proteins
5. Define Functional Food and cite an example

Part B (5X5= 25 marks)

Answer **ALL** questions

- 6a. Discuss ISO certification and its types related to food industry.

OR

- 6b. Discuss Food Labeling requirement under CODEX.

- 7a. State the principle of food packaging. Write a note on packaging material.

OR

- 7b. Mention the Scope and components of food processing.

- 8a. Write a short note on spoilage of canned food.

OR

- 8b. Give an account of conventional method of food preservation.

- 9a. State the chemical composition of milk

OR

- 9b. Give an account of milk borne infections affecting human.

- 10a. Write a short note on nutraceuticals.

OR

- 10b. Write a short note on interaction between food and gene

Part C (5X7= 35 marks)

Answer **ALL** questions

11a. Define Hazard and mention its types with suitable example. State the principles of HACCP.

OR

11b. Write a detailed note on BIS with its certification system

12a. Explain the processing of fruit and vegetables.

OR

12b. Explain the role of enzyme in food processing.

13a. Explain the various intrinsic and environmental factors influencing microbial spoilage of food.

OR

13b. Define food adulterants and cite example. Mention its difference from food additive.

14a. Explain the principle of MBRT. State the differences between MBRT and Resazurin test.

OR

14b. Explain the process of Cheese Production.

15a. Define probiotics and prebiotics and synbiotics. Cite suitable examples and Mention their advantages.

OR

15b. Illustrate the scientific, ethical and other relevant issues concerning GM crops.
