

PARUL UNIVERSITY
FACULTY OF IT & COMPUTER SCIENCE
M.SC. Winter October- 2018 – 19 Examination

Semester: 3**Date: 23/10/2018****Subject Codes: 11201201****Time: 10:30am to 01:00pm****Subject Name: Food and Dairy Microbiology.****Total Marks: 60****Instructions:**

1. All questions are compulsory.
2. Figures to the right indicate full marks.
3. Make suitable assumptions wherever necessary.
4. Start new question on new page.

- Q.1. A) Answer the following questions (08)**
(a) What is fermentation? Explain benefits of fermented food.
(b) Explain fermentative production of sausages.
- Q.1. B) Answer the following questions (any two)**
(a) Answer as asked:
1. What is Baker's yeast? Write about microorganisms used as Baker's Yeast. (04)
2. Write major step of Saurkraut production.
(b) Write note on "starter cultures". (04)
(c) Write a note on "Applications of microbial enzymes in Dairy industries". (04)
- Q.2. A) Answer the following questions**
(a) Answer as asked: (04)
1. Distinguish between "Quality control" and "Quality Assurance".
2. Write symptoms and control of Botulism.
(b) Write a note on "Genetically modified foods". (04)
- Q.2. B) Answer the following questions (any two)**
(a) Answer as asked: (03)
1. Write full form of FDA and ISI.
2. Name the species of *Salmonella* responsible for food poisoning.
3. Define Mycotoxin.
(b) Write a note on "Microbiological quality standards of food". (03)
(c) Write a note on control of "HACCP and its importance". (03)
- Q.3. A) Answer the following questions (08)**
(a) Explain use of high temperature for preservation food.
(b) How radiation can be useful for preserving the food ?
- Q.3. B) Answer the following questions (any two)**
(a) Answer as asked: (04)
1. Explain the use of microwave.
2. Give two examples of naturally occurring antimicrobials.
(b) Write note on use of "Biosensor in food industry". (04)
(c) Write note on "Chemical food preservative". (04)
- Q.4. A) Answer the following questions**
(a) Answer as asked: (04)
1. Explain the role of microorganisms in production of Yoghurt.
2. Explain biochemical reactions involved in vinegar formation. (04)
(b) Write a note on Fermentative production of cheese. (04)
- Q.4. B) Answer the following questions (any two)**
(a) Answer as asked: (03)
1. What is Whey ?
2. Name microorganisms responsible for coffee fermentation.
3. Name fungi responsible for ripening of cheese.
(b) Write note on *Acidophillus* milk and its importance. (03)
(c) Write note on Advanced technologies for preservation of food. (03)