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**MURANG’A UNIVERSITY OF TECHNOLOGY**

**SCHOOL OF HEALTH SCIENCES**

**UNIVERSITY EXAMINATION FOR THE BACHELOR OF SCIENCE IN PUBLIC HEALTH**

**YEAR 3 SEMESTER 2**

**ACADEMIC YEAR 2016/2017**

**UNIT CODE: HPD 3421**

**UNIT TITLE: FOOD TECHNOLOGY AND HYGIENE**

**EXAM VENUE: 9TH FLOOR**

**DATE:**

**TIME: 2HOURS**

**EXAM SESSION:**

**INSTRUCTIONS**

1. **Answer all questions in section A and any other two questions in section B.**
2. **Candidates are advised not write on the question paper.**
3. **Candidates must hand in their answer booklets to the invigilator while in the examination room.**

**Section A. Answer all questions in this section**

1.Define the following terms;

a). Food technology. (1mark)

b).Hygiene (1mark)

c).Genetically modified Organisms (1 Marks)

1. Explain the following terms as applied in food technology
2. Pasteurization (1mark)
3. Blanching (1 mark)
4. Canning (1 mark)

3). Controlled atmosphere storage is used to slowdown ripening of stored fruits. State the three ways of reducing the physiological changes in apples . ( 3marks)

1. State the three food freezing methods applied in commercial use (3marks).
2. Explain the purpose of adding the following food additives (3marks)
3. Chelating agents
4. Buffers
5. Nutrients
6. State any six principles applied when conducting hazard analysis and critical control points in food industry ( 3 marks)
7. State any three benefits of food irradiation (3 marks)
8. Explain the following terms as used in food technology ( 3 marks).
9. Refrigeration
10. Baking
11. Puffing
12. State in three ways of reducing food contamination in cafeteria service ( 3 marks).
13. State any six hygienic practices that should be conducted by employees to assure personal hygiene ( 3 mark).

**section B (Answer any two questions)**

1. a)Discuss any three methods of controlling bacteria, yeast and moulds in stored foodstuff (12) marks)

b) Humans are the largest contaminants of food. Discuss any three groups of human carriers (8 marks).

1. a)Discuss any five common organisms which humans harbor and often cause food poisoning ( 15)

b) State three categories of food borne toxicants ( 6 marks)

1. Discuss ten properties of an ideal sanitizer (20 marks)
2. a) Discuss any three illegitimate use of food additives (12 marks)

b) Discuss any four precautions listed for the food service industry to be considered when applying pesticides (8 marks) .