

**UNIVERSITY OF SWAZILAND
FACULTY OF HEALTH SCIENCES**

EXAMINATION: **Final Examination** May 2006

PROGRAM: Bachelor of Environmental Health Science IV

COURSE: Food Fermentation and Dairy Science

COURSE CODE: EHS 513

INSTRUCTIONS: **ANSWER ANY FIVE (5) QUESTIONS**

TIME ALLOWED: 2.5 Hours

**THIS PAPER MUST NOT BE OPENED UNTIL PERMISSION HAS BEEN
GRANTED BY THE INVIGILATOR.**

QUESTION 1

- a) Briefly discuss the commonly used carbon sources for most fermentations (15 Marks)
- b) Briefly describe two possible sources of micro-organisms that can be used for fermentation culture. (5 Marks)

QUESTION 2

Explain fed - batch culture systems and briefly describe any of its four possible applications in food fermentations. (20 Marks)

QUESTION 3

Explain four reasons for preventing contamination of fermentation systems and briefly describe five practices that you can employ to prevent contamination of your fermentation process. (20 Marks)

QUESTION 4

Discuss the fermentation technology of meat sausages (20 Marks)

QUESTION 5

Explain and illustrate fermentation of milk lactose to organic products (20 Marks)

QUESTION 6

Write short notes about:

- a) Alcoholic dairy drinks (10 Marks)
- b) Value adding of cheese whey (10 Marks)