



**JARAMOGI OGINGA ODINGA UNIVERSITY OF SCIENCE AND TECHNOLOGY
SCHOOL OF HEALTH SCIENCES**

**UNIVERSITY EXAMINATION FOR DEGREE OF BACHELOR OF SCIENCE
PUBLIC HEALTH / COMMUNITY HEALTH AND DEVELOPMENT**

3RD YEAR 2ND SEMESTER 2018/2019 ACADEMIC YEAR

KISII

COURSE CODE: HCD 3323

COURSE TITLE: DEMOGRAPHY AND HEALTH

EXAM VENUE:

STREAM: (BSc. P. Health / Comm Hlth & Dev)

DATE: 18TH APRIL 2019

EXAM SESSION:

TIME: 2.00 HOURS

Instructions:

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

SECTION A: 30 MARKS

1. Briefly discuss three roles of Demography in developing countries. (3 marks)
2. Briefly explain two types of demographic data and give examples of each (3 marks)
3. Discuss three features of a population census (3 marks)
4. Differentiate between achieved and ascribed demographic characteristics and give an example of each (3 marks)
5. Discuss briefly three factors that determine the age and sex structure of a population, and the changes over time (3 marks)
6. Briefly discuss three uses of population projections (3 marks)
7. Briefly discuss three consequences of migration of public health importance (3 marks)
8. Explain three strategies that a country can employ to curb rapid population growth(3 marks)
9. Define rates as used in demography and health and differentiate between crude and specific rates (3 marks)
10. Differentiate between a generation life table and a period life table (3 marks)

SECTION B: 40 MARKS

1. In a population of miners, 6 deaths were recorded every 2 months for a period of one (1) year from January 1st to December 31st, 2006. Some of the data regarding these miners are given in the table below;

Age in Years	Population of Miners in 2006	Mortality rate per 1000000 (all causes of death)	Expected number of deaths
15-19	7989	a	11.04
20-24	37030	1593	b
25-29	c	2868	174
30-34	68687	d	564
35-39	55565	22953	e

- a. Using the table above;
 - i. Calculate for **a, b, c, d, e** in the table above (5 marks)
 - ii. **Calculate the SMR** for this population of miners above (5 marks)
 - iii. **Interpret your** results appropriately (2 marks)
- b. Explain what is meant by standardization and why it is important in demography and health (4 marks)
- c. Distinguish between Direct and Indirect standardization and state the summary measure yielded from calculation of each (4 marks)

2. Discuss the demographic transition theory of population, describing how the natural increase in population changes through the different stages of the model and the probable causes of these changes (20 marks)

3. a. Define vital statistics (1 mark)
 b. What are some of the challenges that vital registration faces in Kenya? (4 marks)

 c. Vital statistics are important to researchers, epidemiologist, health planners, and other health professionals. Discuss. (15 marks)

4. Study each population pyramid & answer the questions below for each graph:
 - a. Which type of population pyramids are represented below (2 marks)
 - b. Describe and give reasons for each of the population pyramids (10 marks)
 - c. Which stage is each of the population in - in the Demographic Transition Model - give reasons for your answer (6 marks)
 - d. List and explain two demographic measures that can be obtained from population pyramids (2 marks)

