



# MERU UNIVERSITY OF SCIENCE AND TECHNOLOGY

P.O. Box 972-60200 – Meru-Kenya.  
Tel: +254 (0)799529958, +254 (0)799529959, +254 (0)712524293  
Website: [www.must.ac.ke](http://www.must.ac.ke) Email: [info@must.ac.ke](mailto:info@must.ac.ke)

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UNIVERSITY EXAMINATIONS 2023/2024

FOURTH YEAR SECOND SEMESTER EXAMINATION FOR THE DEGREE OF BACHELOR OF  
SCIENCE IN HEALTH SYSTEM MANAGEMENT

## NNH 3453: HEALTH MANAGEMENT INFORMATION SYSTEMS

DATE: APRIL 2024

TIME: 2 HOURS

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**INSTRUCTIONS: ANSWER QUESTION ONE AND ANY OTHER TWO**

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### QUESTION ONE (30 MARKS)

- Explain five sources of bihealth Management information systems (5marks)
- Differentiate between eHealth and mHealth as used in healthcare (2marks)
- Describe four roles played by HMIS managers in Kenya health system. (4 Marks)
- State five sub-systems within Clinical Information System (CIS). (5 Marks)
- Highlight five prerequisites for developing Patient Care Information Systems. (5 Marks)
- Interpret four implications of The Data Protection Act on Kenya Healthcare system. (4Marks)
- Outline five benefits of using Computerized Physician Order Entry system (CPOE). (5marks)

### QUESTION TWO(20MARKS)

Health care fraud is a form of white collar crime. There is a trend toward increased participation by organized crime groups in complex healthcare fraud schemes. Healthcare fraud is fast becoming one of law enforcement's major priorities. Using your knowledge on use of technology to tackle fraud, answer the following questions.

- Describe five Information Technologies used in fraud detection in healthcare. (10 Marks)
- Explain five reasons for disclosing patients' records content. (10Marks)



MUST is ISO 9001:2015 and



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### **QUESTION THREE(20MARKS)**

A Health Management Information System (HMIS), also called a Routine Health Information System, facilitates the collection of periodic health service delivery and public health indicators from a variety of information systems and the effective use of information at facility, district, and higher levels to help improve health care outcomes. Using Kenya HMIS answer the following questions.

- a) Describe five elements of HMIS in Kenya. (10Marks)
- b) Discuss five types of I-IMIS used in Kenya health systems. (10Marks)

### **QUESTION FOUR(20MARKS)**

Healthcare data sets include a vast amount of medical data, various measurements, financial data, statistical data, demographics of specific populations, and insurance data, to name just a few, gathered from various healthcare data sources. Answer the following questions in relationship to healthcare data.

- a) Describe five characteristics of good quality data. (10Marks)
- b) Evaluate five types of health data found in our health systems. (10Marks)



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