

MURANG'A UNIVERSITY OF TECHNOLOGY

SCHOOL OF COMPUTING AND INFORMATION TECHNOLOGY

DEPARTMENT OF INFORMATION TECHNOLOGY

UNIVERSITY POSTGRADUATE EXAMINATION 2024/2025 ACADEMIC YEAR

FIRST YEAR FIRST SEMESTER EXAMINATION FOR MASTER
OF SCIENCE IN INFORMATION TECHNOLOGY
SIT 811 – MANAGEMENT INFORMATION SYSTEM
DURATION: 3 HOURS

INSTRUCTIONS TO CANDIDATES:

- 1. Answer any FOUR questions.
- 2. Mobile phones are not allowed in the examination room.
- 3. You are not allowed to write on this examination question paper.

QUESTION ONE (25 MARKS)

Case study

Tech Innovations Inc. is midsized Technology Company specialising in software development and IT consulting with a rapidly growing workforce of over 300 employees the HR-department failed significant challenges in managing employee data, recruitment performance valuation and compiling with labour laws. To address these challenges, the company decided to implement a Human Resource Information System (HRIs)

- (i) Identify and explain the key challenges that the technology innovations Inc. faced before implementing the HRIS (6 marks)
- (ii) Evaluate the role of training in the successful implementation of the HRIS as Tech innovation Inc. What specific training strategies were used? (6 marks)
- (iii) Analyse how the automation of the process through HRIS contributed the increased efficiency of the tech innovation Inc. Provide specific examples from the case study. (6 marks)
- (iv)Discuss how the HRIs improved compliance with labor laws for tech innovations Inc. What features were critical in this regard (7 marks)

QUESTION TWO (25 MARKS)

- (a) Critically analyse the role of knowledge codification within this and its impact an organisation learning and development. (5 marks)
- (b) Evaluate how HRIs can foster a culture of knowledge sharing and retention in computer organizational structure. (4 marks)
- (c) Assess the strategic advantages that robust HRIs can provide
 - (i) To organizations in competitive industries. (4 marks)
 - (ii) Illustrate your argument in (i) with a case study of a company that successfully implemented HRIs for strategic plan. (3 marks)
- (d) Conduct a comparative analysis of Information System (Is) and Information Technology (IT) in the contest of HR, emphasizing their roles and interdependencies. (4 marks)
- (e) Identify challenges organisations may fail when transitioning from a manual HR system to an HRIs (3 marks)

QUESTION THREE (25 MARKS)

- (a) Describe the significance of used training in the successful implementation of HRIs. (6 marks)
- (b) Identify and elaborate on **THREE** key characteristics that define high performing MIS in HR contents. (6 marks)
- (c) Prepare **THREE** advanced security measures that organisations should adopt to protect HR data in an increasingly digital landscapes. (8 marks)
- (d) Evaluate the ethical implications of HR data management and how organizations can navigate these challenges. (5 marks)

QUESTION FOUR (25 MARKS)

- (a) Evaluate the potential impacts of artificial intelligence and machine learning on HRIs functionalities, focusing on recruitment and employee engagement. (6 marks)
- (b) Discuss how big data analysis can drive innovation in HRIs and its applications in predictive analytics. (5 marks)
- (c) Discuss the significance of integrating HRIs with other enterprise systems (such as ERP & CRM) and the challenges involved in this process (8 marks)
- (d) Critically assess the implications data privacy regulations such as GDPR on HRIs implementation and operation. (6 marks)

QUESTION FIVE (25 MARKS)

- a) Define the term 'Information system' and differentiate between MIS and DSS. (5 marks)
- b) Explain the concept of data-warehouse and its importance in an MIS environment. How does it support business intelligence initiatives? (5 marks)
- c) Discuss the role of Chief Information Officer (CIO) in managing MIS within an organization. Mention at least three key responsibilities of the CIO. (5 marks)
- d) Describe two ways in which MIS can improve customer service in an organization. Provide examples to support your answer. (5 marks)
- e) Identify two ethical concerns related to data privacy in MIS. Suggest strategies organizations can use to address these concerns. (5 marks)