



**UNIVERSITY OF ESWATINI
Faculty of Health Sciences
Department of Environmental Health Science**

**BACHELOR OF SCIENCE IN ENVIRONMENTAL
MANAGEMENT AND OCCUPATIONAL HEALTH**

2020 AUGUST FINAL EXAMINATION PAPER

TITLE OF PAPER : ACCIDENT/INCIDENT INVESTIGATION & REPORTING
COURSE CODE : EHS 440
DURATION : 2 HOURS
MARKS : 100

INSTRUCTIONS

- 1. Read the questions & instructions carefully**
- 2. Question 1 is compulsory**
- 3. Then answer ANY OTHER THREE (3) questions**
- 4. Each question is weighted 25 marks**
- 5. Write neatly and clearly**
- 6. Begin each question in a separate sheet of paper**
- 7. Numbering within a chosen question should be in a sequential order**
- 8. BEGIN EACH QUESTION ON A SEPARATE SHEET OF PAPER.**

**DO NOT OPEN THIS QUESTION PAPER UNTIL PERMISSION IS GRANTED BY
THE INVIGILATOR.**

QUESTIO 1

- a. The following question requires a true/false response. Only write F or T on the answer sheet. Each question carries 2 marks. (20)
- i. Incident investigation that only focuses on correcting root causes and blaming the accident causer is useless.
 - ii. Accident investigation should identify corrective actions even if it does not prevent future incidents.
 - iii. If the investigating team wants immediate an investigating team should look to the immediate cause of the accident.
 - iv. When a short coming has been identified during an investigation, it is important to ask why it existed and not corrected.
 - v. Carelessness and or failure to follow a procedure alone are the causes of an accident.
 - vi. If one thinks safety is expensive, one should try an accident.
 - vii. An occurrence is an accident that is extended over a period of time rather than a single observable happening.
 - viii. A near-miss is an event with the potential to causing injury or ill-health.
 - ix. A dangerous occurrence is one of a number of specific reportable adverse events.
 - x. Root causes of accidents are always due to employees' negligence.
- b) Define due diligence with regards to health and safety in the workplace (5)

QUESTION 2

- a) Give a typical drawing of the Risk Assessment Matrix (15).
- b) Write short notes on the following parameters.
 - i. Accident root causes (2)
 - ii. Underlying causes (2)
 - iii. Immediate causes (2)
 - iv. Risk control measures (2)
 - v. Lost Time Injury (2)

QUESTION 3

- a) What type of consequences would be represented by the following behaviour outcome; R+, R- and P? (8)
- b) What reasons may cause lack of attention by workers under human behaviour and then outline the responses that may be displayed by the workers (9)
- c) When can punishment under human behaviour method be effective? (4)
- d) What would you do if you had to don PPE for 15 min to enter an area where you will switch off a control valve that will take 10 sec to do? (4)

QUESTION 4

- a) What is represented by the following Codes both in the location and consequences of an accident or injury; A, C, E, Z? (16)
- b) In order for an accident to occur, it has to go through three phases. Discuss these phases with appropriate examples (9)

QUESTION 5

- a) In order to win a certain human behaviour, how should the corrective measures be? (6)
- b) Describe a commuting accident and the different considerations that have to be taken into account for it to qualify as such (8)
- c) When interviewing persons during an accident. There are certain persons who have to be interviewed. Who are these people? (6).
- d) If one is collecting evidence one should collect it from three sources. All the 3 stages in information gathering should be checked against some key issues. What are these issues? (5).