

NATIONAL UNIVERSITY OF SCIENCE AND TECHNOLOGY
FACULTY OF THE BUILT ENVIRONMENT
BACHELOR OF QUANTITY SURVEYING (HONOURS) DEGREE
PART I SUPPLEMENTARY EXAMINATIONS – AUGUST 2013
BUILDING CONSTRUCTION I - AQS 1110

Time: 3 hours

Total marks: 100

Instructions

Answer any four questions

Question One

- a) Describe fully any three types of foundations including conditions under which you can recommend their use. [15 marks]
- b) What safety precautions do you need to consider when doing operations in deep excavations? [10 marks]

Question Two

- a) Detail construction features of a retaining wall that prevents the penetration of water into a building. [10 marks]
- b) “Bonding in brickwork is done following a pattern that will enable the load to be distributed evenly, thus ensuring the stability of the wall and its improved appearance.” Illustrate any five bonding types that can be considered using our local standard brick in wall construction. [15 marks]

Question Three

- a) Discuss five functional requirements of a ground floor. [15 marks]
- b) Distinguish a fire door from an ordinary hollow core flush door. [10 marks]

Question Four

- a) Identify any three types of stairways and describe the major features of each.[15 marks]
- b) Sketch any five types of timber trusses that are found in the construction industry.
[10 marks]

Question Five

The most appropriate form of roof structure for a particular building depends on a number of factors. Explain these factors. [25 marks]

END OF EXAMINATION