

FEDERAL UNIVERSITY OF TECHNOLOGY, MINNA
SCHOOL OF ENVIRONMENTAL TECHNOLOGY
DEPARTMENT OF QUANTITY SURVEYING
FIRST SEMESTER EXAMINATION, 2016/2017 ACADEMIC SESSION

COURSE TITLE: Advanced Building Measurement I

COURSE CODE: QTS 511

LEVEL: 500L

TIME ALLOWED: 2 1/2 Hours

INSTRUCTIONS: Answer all questions; Only BESMM3 and BESMM4 are allowed; and All assumptions must be clearly and reasonably stated

Question One

Drawing No QTS511/2017/01 is a sectional view of a cold-water installation for a proposed residential development at the Gidan K wano campus of the Federal university of Technology, Minna. You are required to use the attached drawing (Drawing No QTS511/2017/01) and Detail 01 to take off quantities for the following:

- a) Cold water installation (Complete)..... (22 Marks)
- b) Sanitary appliances..... (5 Marks)
- c) Hot water cylinder and boiler..... (3 Marks)

Question Two

Use the attached Drawing No QTS511/2017/02 and Detail 02 to take off quantities for the following in drains below ground level:

- a) Manhole (Complete)..... (7 1/2 Marks)
- b) Trench excavation for pipework; pipework and associates; and concrete hunching to pipes only..... (7 1/2 Marks)

Question Three See (Drawing No; QTS 511/2017/03).

The management of the Federal University of Technology, Minna is proposing to construct a 10-storey office building for the staff of S.E.T. It is required that installation of a lift in the building will provide a means of vertical transportation within floors. You have been consulted as a final year student of QS department of the institution to take off for:

- a) Lift shaft (concrete work and formwork only) (6 Marks)
- b) Lift machine and general builders' work..... (4 Marks)
- c) List and explain the common classification..... (5 Marks)