



JARAMOGI OGINGA ODINGA UNIVERSITY OF SCIENCE AND TECHNOLOGY

SCHOOL OF ENGINEERING AND TECHNOLOGY

**UNIVERSITY EXAMINATION FOR THE DEGREE IN SCIENCE IN
CONSTRUCTION MANAGEMENT**

**2ND YEAR 1ST SEMESTER 2024/2025 ACADEMIC YEAR
CENTRE: MAIN CAMPUS**

COURSE CODE: TCB 1209

COURSE TITLE: WORKSHOP TECHNOLOGY I

EXAM VENUE: STREAM: BSc. CONSTRUCTION MGT

DATE: 10/1/2025 EXAM SESSION:9-11.00 AM

DURATION: 2 HOURS

Instructions

- 1. Answer question 1 (Compulsory) and ANY other two questions**
- 2. Candidates are advised not to write on question paper**
- 3. Candidates must hand in their answer booklets to the invigilator while in the examination room.**

QUESTION ONE

- a) Explain any SIX safety requirements in a workshop containing both hand and power tools
(6 Marks)
- b) State any THREE types of fire and their extinguishing agent
(6 Marks)
- c) In reference to setting out exercise, sketch a detailed corner profile
(8 Marks)

QUESTION TWO

- a) Draw two consecutive courses for corner joints of one brick wall with the following bonds:
 - i. Flemish and
 - ii. English bond.
(10 Marks)
- b) With the aid neat sketches, distinguish between Rubble stone walling and Ashler stone walling.
(5 Marks)

QUESTION THREE

- a) Outline common steps in manufacturing of concrete in a construction site
(5 Marks)
- b) Distinguish between pointing and jointing and state ONE advantage of each.
(4 Marks)
- c) State any THREE plastering failures and explain their causes.
(6 Marks)

QUESTION FOUR

- a) Using a free hand sketch, draw the following joints
 - i. Stopped housing l joint
 - ii. Tongued and grooved joint
(6 Marks)
- b) State the functions of the following hand tools used in general carpentry work
 - i. Rebate plane
 - ii. Router plane
 - iii. spokeshave
 - iv. Brace
(6 Marks)
- c) State any THREE advantages of screws over nails in wood assembly.
(3 Marks)