



**AFRICA
UNIVERSITY**

(A United Methodist-Related Institution)

FACULTY OF MANAGEMENT AND ADMINISTRATION

COURSE TITLE: CSC303 HUMAN COMPUTER INTERACTION

SEMESTER 2: FINAL EXAMINATION NOV-DEC 2014

LECTURER: Agrippah KANDIERO

TIME: 3 HOURS

Answer questions as specified in each section.
Total possible mark is **100**.

Start **each Section B** question on a new page in your answer booklet.

The marks allocated to **each** question are shown at the end of the section.

Avoid zero-intelligible content and answer in expanded bullet point form.

Credit will be awarded for logical, systematic and neat presentations.

SECTION A (Answer all questions)

1. Define design in HCI [5]
2. Outline and describe the design process [10]
3. Define and illustrate the waterfall model for HCI [5]
4. Outline and describe the ISO 9241 Model [5]
5. Outline and describe the IBIS model [5]
6. Outline and describe HCI evaluation techniques [5]
7. What are the universal HCI design principles [5]

SECTION B (Answer **ALL** questions)

1. Task Analysis Model

- a)** Define task analysis [4]
- b)** Outline and describe task analysis techniques [4]
- c)** Compare and contrast task analysis vs cognitive models [4]
- d)** Outline and describe task decomposition [4]

2. Cognitive Model

- a.** Define linguistic notations and identify and describe the main forms of linguistic notations giving examples [10]
- b.** Outline and describe GOMS and give an example [5]
- c.** Outline and describe CCT and give an example [5]

3. Evaluation Techniques

Outline and describe the following HCI evaluation techniques

- a. Cognitive Walkthrough [5]
- b. Heuristic Evaluation [5]
- c. Evaluating through user participation [5]
- d. Observational Methods [5]

THE END