



NATIONAL OPEN UNIVERSITY OF NIGERIA,
PLOT 91, CADASTRAL ZONE, UNIVERSITY VILLAGE, JABI – ABUJA
FACULTY OF SCIENCES
2023 2 EXAMINATIONS—

COURSE CODE: CIT851

COURSE CREDIT: 3

COURSE TITLE: ADVANCED SYSTEMS ANALYSIS AND DESIGN

TIME ALLOWED: 2¹/₂ HOURS

**INSTRUCTION: ANSWER QUESTION ONE (1) AND ANY OTHER FOUR (4)
QUESTIONS**

QUESTIONS

- 1a. Mention and briefly explain any four (4) duties of a Systems Analyst. **(6 marks)**
- 1b. Write short notes on the following SDLC phases.
i. Project identification and selection
ii. Project initiation and planning
iii. Physical design
iv. Implementation **(6 marks)**
- 1c. Identify and describe the steps you would take to design a database for **Jekins** firm **(3 marks)**
- 1d. Evaluate the concept of Decision Tree, within the context of Systems Analysis and Design. **(2 marks)**
- 1e. Distinguish between Front-End and Back-End CASE tools, giving examples of each of them **(3 marks)**
- 1f. Write a short note on Referential Integrity **(2 marks)**

[22 marks total]

- 2a. In simple terms, analyse the Divide-and-Conquer approach of system development. **(3 marks)**
- 2b. Write short notes on the following Information System development approaches;
i. Prototyping
ii. Joint Application Development
iii. Participatory Design **(6 marks)**

v

- 2c. Evaluate the concept of "forward engineering" in system development . **(3 marks)**