



NATIONAL OPEN UNIVERSITY OF NIGERIA
Faculty of Education
Department of Library and Information Science
2024 1 EXAMINATION

Course Title: Research Methods and Statistics in Library & Information Science
Course Code: LIS305 (3CU)
Time Allowed: 3 Hours
Instruction: Please carefully read and take note of the instruction below:
Answer three questions in all, question one and any other two questions.

Question 1

- a. A variable is any characteristic that assumes measurable values. Explain. (3marks)
- b. Differentiate between: -
 - i. Dependent and independent variables (6marks)
 - ii. Discrete and continuous variables (6marks)
- c. What is Case Study research? Explain four (4) characteristics of case study research. (12marks)
- d. List three (3) categories of a case study (3marks). Total 30marks.

Question 2

- a. Explain the relationship between research question and research objective (8marks)
- b. Briefly explain any three (3) of the following:
 - i. Statement of problem (3marks)
 - ii. Justification of the research (3marks)
 - iii. Significance of the research (3marks)
 - iv. Scope of the research (3marks)
 - v. Background of the study (3marks). (12marks). Total 20marks.

Question 3

- a. Explain the significance of validity in research (2marks)

Question two

- a. What is profit planning? **(3 marks)**
- b. If budgetal sales amount to ₦500,000 suspected variable costs amount to ₦300,000 and expected fixed costs amount to ₦100,000. The firm desires to earn after-tax profit of ₦54,000, tax rate is 40%.

Required

Compute the sales volume required to earn the desired profit after tax **(17 marks)**

Total = 20 marks

Question three

- a. A firm sells its product for ₦100 per unit, it has variable costs of ₦50 per unit and fixed costs of ₦25,000.

Required,

Determine the firm's degree of operating leverage at 1,000 units and 1500units of sales,

(10 marks)

- b. A firm has bond issue of ₦40,000 with a 5% coupon and an issue of 10% preferred stock of 500 shares at ₦40 per share, it also has 1,000 shares of common stock outstanding,

Required:

Calculate the levels of EPs resulting from ECIT of ₦10,000 and ₦14,000 with a tax rate of 50%

(10 marks)

Total = 20 marks

Question four

- a. What is dividend policy? **(5 marks)**
- b. Explain the following theories ;
- i. Relevance view of dividend policy **(8 marks)**
- ii. The irrelevance view of dividend policy **(7 marks)**

Total = 20 marks