NATIONAL OPEN UNIVERSITY OF NIGERIA
PLOT 91, CADASTRAL ZONE, NNAMDI AZIKIWE EXPRESS WAY, JABI – ABUJA
FACULTY OF MANAGEMENT SCIENCES
DEPARTMENT OF BUSINESS ADMINISTRATION
2021_1 EXAMINATION

COURSE CODE: BUS406 **CREDIT UNIT: 3**
COURSE TITLE: ANALYSIS FOR BUSINESS DECISIONS
TIME ALLOWED: 2 ½ HRS
INSTRUCTIONS:
1. Attempt Question One (1) and any other three (3) questions
2. Question 1 carries 25 marks, while the other questions carry 15 marks each.
3. Present all points in coherent and orderly manner

1a. Contingency Matrix 1

States of Nature	Alternatives		Probability
	Stock Rice (A_1)	Stock Maize (A_2)	
High demand (S_1) (₦)	4,000	15,000	0.6
Low demand (S_2) (₦)	7,000	-5,000	0.4

Compute the EMY for alternatives A_1 and A_2 and draw out optimal contingency strategy.

15Marks

1b. Discuss various classifications of inventories. **10Marks**

2a. Outline six (6) Limitations of the EOQ Model. **6Marks**

2b. Describe the phases in decision analysis. **9Marks**

3a. Discuss four (4) steps involves in decision theory approach. **8Marks**

3b. Briefly discuss the phases involved in the Scientific Method in Operations research. **7Marks**

4. Customers arrive at a service facility to get required service. The interval and service times are constant and are 1.8minutes and minutes respectively. Simulate the system for 14minutes. Determine the average waiting time of a customer and the idle time of the service facility. **15Marks**

5a. Describe Monte Carlo Simulation and steps involved. **9Marks**

5b. Discuss assumptions of Linear Programming. **6Marks**