THE CATHOLIC UNIVERSITY OF EASTERN AFRICA

A. M. E. C. E. A

MAIN EXAMINATION

SEPTEMBER – DECEMBER 2019 TRIMESTER

SCHOOL OF BUSINESS

DEPARTMENT OF MARKETING AND MANAGEMENT

REGULAR PROGRAMME

CMM 412: PRODUCTION AND OPERATIONS MANAGEMENT

Date: DECEMBER 2019	Duration: 2 Hours
INSTRUCTIONS: Answer Question ONE and any other TWO Questions	

Q1.   a)   "Production managers are more than ever before at the centre of
competitiveness of an organization". Discuss.

(5 Marks)

        b)   A project consists of activities from A to j as shown in the following
table. The immediate predecessor(s) and the duration in
weeks of   each of the activities are given in the same table as
shown.

Activity	Immediate predecessor(s)	Duration (Weeks)
A	-	4
B	-	3
C	A,B	2
D	A,B	5
E	B	6
F	C	4
G	D	3
H	F,G	7
I	F,G	4
J	E,H	2

Required:
    i)   Draw the project network

(5 Marks)
    ii)   Identify the critical path and calculate the corresponding project completion time.

(5 Marks)
    iii)   Also find the total float as well as free float for each of the non-critical activities.

(5 Marks)

Q2.   Regarding quality management, answer the following:

a) Assume you have a big restaurant in Nairobi Town. What can high quality of product and service mean to your business, and how can contribute to the success of your business? Explain by giving examples.

(10 marks)

b) What you understand by the term total quality management (TQM)? What are the basic principles that guide it? Explain each of the steps.

(10 marks)

Q3.   As a foreign investor, you are looking forward to setting up a manufacturing plant in East Africa. How do you make a choice of a country, a community within the country, and a particular site? Explain.

(20 Marks)

Q4.   a)   Define the term project. Using relevant examples, briefly discuss the various features of a project.

(10 Marks)

           b)   Identify the principal resources (inputs), the type of transformation process and principal output (goods or services) in each of sectors below:
        i.   Restaurant
        ii.   Banking
        iii.   Hospital
        iv.   Supermarkets
        v.   Church
        vi.   Automobile factory
        vii.   Bakery
        viii.   Taxi services
        ix.   University

(10 Marks)

BONUS QUESTION   **(5 Marks)**

If it takes 5 machines 5 minutes to make 5 gadgets, how long would it take 100 machines to make 100 gadgets?

END