



MASENO UNIVERSITY

UNIVERSITY EXAMINATIONS 2013/2014

**FIRST YEAR SECOND SEMESTER EXAMINATIONS FOR THE
DEGREE OF MASTER OF EDUCATION (PLANNING &
ECONOMICS OF EDUCATION)**

(MAIN CAMPUS)

EMA 845: MICRO (PROJECT) PLANNING IN EDUCATION

Date: 16th April, 2014

Time: 2.00 - 5.00 p.m.

INSTRUCTIONS:

- **Answer THREE questions. Question ONE is COMPULSORY.**



(MAIN CAMPUS)

EMA 845: MICRO (PROJECT) PLANNING IN EDUCATION.

DATE----- TIME-----

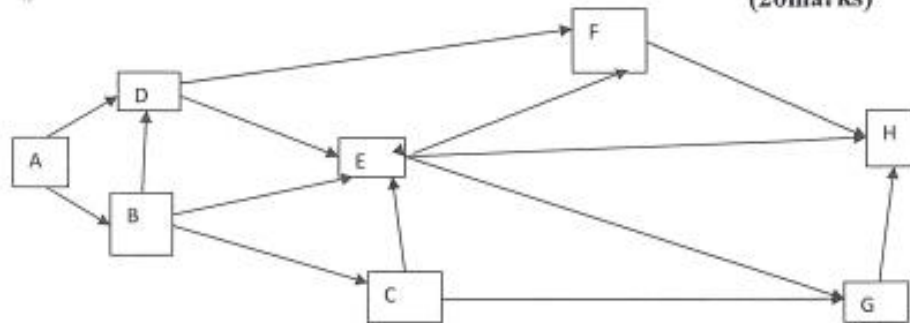
INSTRUCTION: ANSWER THREE QUESTIONS: QUESTION ONE IS COMPULSARY

Q1. Formulate a flow chart for the following activities and determine the critical path and the float times **(20marks)**

Activity	duration
A= Create a Schedule	10days
B = Buy Hardware	5 days
C = Programming	20 days
D = Installation	5 days
E = Test Code	20 days
F = write man	15 days
G = Conversion	5 days
H = Test system	10 days
I = Training	5 days
J = Retrial	5 days) dummy activity
K = Retraining	5 days) dummy activity
L = User Test	10 days
M = Reviewing	2 days

Q2. Redraw the diagram below by inserting activity time and the critical path. Find the critical path and float time given the following additional information.

(20marks)



AD = 3DAYS, AB = 4 Days, BD = 5 DAYS, DF = 9 DAYS, DE = 7 DAYS, BE = 8 Days

BC = 5 DAYS, CE = 6 DAYS, CG = 4 DAYS, EG =, EH = 3DAYS, EF = 10 DAYS, FH = 3 DAYS, GH = 5 DAYS.

Q3. Consider the activities shown below for the construction of a garage

ACTIVITY	DURATION
Prepare foundation	7 days
Make and position door frame	2 days
Lay drains, floor base and screed	15 days
Install services and fittings	8 days
Erect Walls	10 days
Plaster ceiling	2 days
Erect roof	5 days
Install Door and Windows	8 days
Fit Gutters and pipes	2 days
Paint outside	3 days

a) Draw the path for the activities

(6marks)

- b) Formulate a table for backward and forward activities to determine float time and critical path. **(14 marks)**
- Q4. (a) Discuss the Advantages and disadvantages of Program Evaluation and Review Technique (PERT) **(10 marks)**
- (b) Discuss the applications of PERT in Project Evaluation **(5marks)**
- (C) Examine the importance of critical path in project management **(5 marks)**
- Q5. Advise the project manager by determining the critical path and float time of Activity Network below to find two critical paths to be followed to complete the project. Which path should be avoided and why? **(20 marks)**

NETWORK DIAGRAMS.

