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INDUSTRIAL ORGANIZATION

AND MANAGEMENT

Oct./Nov. 2017 Time: 3 hours



THE KENYA NATIONAL EXAMINATIONS COUNCIL

DIPLOMA IN MECHANICAL ENGINEERING

(PRODUCTION OPTION)
(PLANT OPTION)
(FABRICATION TECHNOLOGY AND METALLURGY OPTION)
(MATERIALS TECHNOLOGY AND METALLURGY OPTION)
DIPLOMA AUTOMOTIVE ENGINEERING
DIPLOMA IN CONSTRUCTION PLANT ENGINEERING
DIPLOMA IN AGRICULTURAL ENGINEERING
(FARM POWER AND MACHINERY OPTION)
DIPLOMA IN AERONAUTICAL ENGINEERING
(AIRFRAMES AND ENGINES OPTION)

INDUSTRIAL ORGANIZATION AND MANAGEMENT

3 hours

INSTRUCTIONS TO CANDIDATES

You should have an answer booklet and Non-programmable Scientific calculator/Mathematical Tables for this examination.

Answer FIVE of the EIGHT questions in the answer booklet provided.

All questions carry equal marks.

Maximum marks for each part of a question are as indicated.

Candidates should answer the questions in English.

This paper consists of 4 printed pages.

Candidates should check the question paper to ascertain that all the pages are printed as indicated and that no questions are missing.

- (a) State four advantages of centralised stores.

- (4 marks)
- With an illustration in each case, explain the following documents used in stores: (b)
 - (i) bin card:
 - (ii) stores ledgers.

(6 marks)

Electric cables have a steady rate of demand of 20,000 per year. Placing an order costs (c) Ksh. 1,200 and it costs Ksh. 12 to hold stock for a year.

Calculate:

- economic Order Quantity; (i)
- (ii) number of orders per year.

(5 marks)

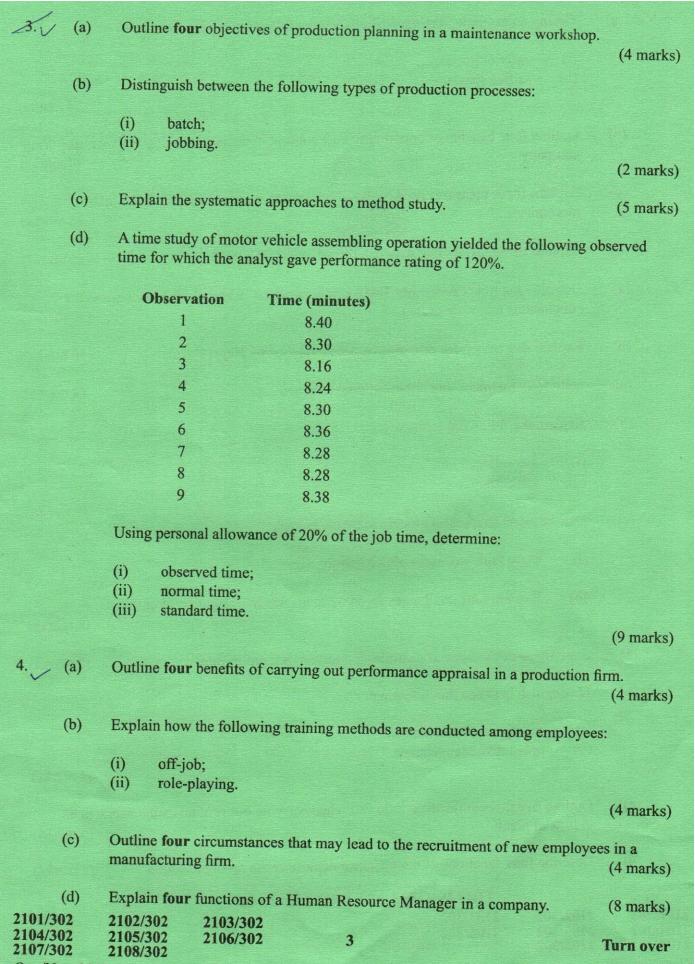
- Naco Fish Processors Limited had initial inventory of 100 tonnes which was (d) replenished by a further 100 tonnes continuously over a time period. For the next time, there was no activity, but at time point 2, 100 tonnes were demanded followed over the next two times period by a continuous demand which used up the last 100 tonnes before a further 150 tonnes were delivered. Using the information above, plot a labelled (5 marks)
- 2. State four advantages of Programme Evaluation and Review Technique (PERT) in (a) (4 marks) (b)
 - The following schedule represents activities of Bora Construction Company.

Preceding Activity		
	Duration (days)	
	3	
	3	
	7	
	1	
	2	
	2	
	1	
	2	
. в	1	
	Preceding Activity A DI B C E, F, G B	

Using the above information:

- (i) draw the network;
- (ii) identify the critical path;
- (iii) estimate the critical project duration.

(16 marks)



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5.∨	(a)	Giving an example, distinguish between the following types of goods:	
		(i) inferior goods; (ii) Giffen goods.	
			(4 marks)
	(b)	Outline four benefits of opportunity cost concept in decision making in a n company.	
	(c)	Explain three measures used by the Government to reduce the effects of primechanism.	
	(d)	Explain three factors that may determine supply of a product.	(6 marks)
*	(a)	Describe the Relay Assembly Test room experiment in Hawthorne studies a conclusions that were drawn.	and the (10 marks)
	(b)	Explain five principles of management developed by Henri Fayol.	(10 marks)
7.	(a) -	State four merits of line organizational structure.	(4 marks)
	(b)	Explain the following terms:	
		(i) job enlargement; (ii) job enrichment.	
	(c)	Delegation is an integral process in management.	(4 marks)
		(i) State four processes of delegation;	
		(ii) Explain four challenges faced by managers in delegation of duties.	410
8. V	(a)	State three advantages of centralised maintenance programme.	(12 marks)
	(b)		(3 marks)
	(0)	Distinguish between the following:	
		(i) emergency maintenance; (ii) preventive maintenance.	
			(4 marks)
	(c)	Outline five procedural steps followed when carrying out routine maintenance industrial plant.	ce in an (5 marks)
	(d)	Describe four functions of maintenance department in an organisation.	(8 marks)
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