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Code: 19MBA2004

SET-I

ADITYA INSTITUTE OF TECHNOLOGY AND MANAGEMENT, TEKKALI
(AUTONOMOUS)

I MBA II Semester Regular & Supplementary Examinations, November-2021
OPERATIONS MANAGEMENT

Time: 3 Hrs

Max. Marks: 60

Answer any Five questions
All questions carry EQUAL marks
Question No. 8 is Compulsory

1. a) Define production. What do you understand by factors of production? 6 Marks
b) Write short notes on (a) Batch production and (b) Continuous production. 6 Marks
2. What is meant by plant location? What factors affect the choice of a suitable place for plant location? 12 Marks
3. What is aggregate planning? Explain the process of aggregate planning. 12 Marks
4. a) What is scheduling? What are its objectives? 6 Marks
b) Explain the importance of Line Of Balance in the production control. 6 Marks
5. a) Discuss the factors on which productivity depends. 6 Marks
b) What are the benefits from application of work study programme? 6 Marks
6. List six places in a production process where inspection should be considered. 12 Marks
7. Describe the method of drawing Mean chart and R chart. State the formulae you would use in both the cases. 12 Marks
8. CASE STUDY: 12 Marks

Problem:

Construct suitable control chart from the following data:

Sample No.	Observations
1	10, 11, 13, 15
2	11, 9, 10, 13
3	10, 10, 9, 11
4	11, 14, 12, 10
5	8, 10, 9, 14

Given $A_2 = 0.729$, $D_3 = 0$ and $D_4 = 2.282$

Time: 3 Hrs**Max. Marks: 60**

**Answer any Five questions
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Question No. 8 is Compulsory**

1. Brief about Historical Evolution of Production and Operations Management.
2. Define Plant Location? Discuss the factors which determine the location of a plant.
3. The following jobs are to be processed on machine A and after machine B. The time required to complete the operation on each machine is as follows: (Time in hrs)

Jobs	1	2	3	4	5	6	7
Machine A	16	20	08	10	16	20	15
Machine B	18	23	15	09	25	15	12

Determine the optimum sequence of jobs that minimizes the total time to complete the each of the jobs.

4. Define Material Resource Planning (MRP). How the MRP is useful to the cost of production?
5. What is Productivity? Discuss about various factors affecting Productivity?
6. What is Inventory? Explain the techniques used in Inventory Management.
7. What are Control Charts? Explain different Control Charts with their importance.

8. **CASE STUDY:**

Problem:

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