### MP-204(Old)/MP-109

December - Examination 2017

# Master of Business Administration - I Year Examination

## **Operations Management**

Paper - MP-204(Old)/MP-109

Time: 3 Hours [ Max. Marks: - 80

**Note:** The question paper is divided into three sections A, B and C. Write answers as per given instructions.

#### Section - A

 $8 \times 2 = 16$ 

(Very Short Answer Questions)

**Note:** Answer **all** questions. As per the nature of the question delimit your answer in one word, one sentence or maximum upto 30 words. Each question carries 2 marks.

- 1) (i) Define two objectives of work study.
  - (ii) Draw a production system model.
  - (iii) Define product design.
  - (iv) Define Supply Chain Management.
  - (v) What is the purpose of ISO-9000 in Industry?

- (vi) Write importance of Materials Management.
- (vii) Determine labour productivity for 2 labours produced 100 good pieces in 8 hrs.
- (viii) Write formula for Economic order quantity.

#### Section - B

 $4 \times 8 = 32$ 

(Short Answer Questions)

**Note:** Answer **any four** questions. Each answer should not exceed 200 words. Each question carries 8 marks.

2) A cement plant produced cement worth \$100000. The input consumed for a particular period are as below:

Manpower Input = \$ 15,000

Material Input = \$ 60,000

Energy Input = \$ 15,000

Capital Input = \$ 8,000

Other minor Input = \$ 2,000

Calculate the partial productivities for Human productivity, Material productivity, Capital productivity, Energy productivity, Other minor productivity.

- 3) Draw a line diagram of supply chain management for a petrol filling station from crude oil. Explain the key drivers in supply chain management.
- 4) What is standard time? How its important in manufacturing industry. Write down steps of work measurement.

- 5) You are working as quality documentation engineer in a frig manufacturing company. You are being asked by managements to obtain ISO-9002 from authorized organisation.
  - (i) Explain ISO 9002.
  - (ii) Explain requirements of ISO 9002 with respect to frig manufacturing company certification.
- 6) Differentiate between job rotation; job enlargement and job enrichment in detail.
- 7) Distinguish between mass production system and batch production system.
- 8) Explain in detail both quantitative and qualitative factors to be considered in choosing a location for a paint manufacturing industry.
- 9) What do you mean by Inventory scheduling?

#### Section - C

 $2 \times 16 = 32$ 

(Long Answer Questions)

**Note:** Answer **any two** questions. You have to delimit your each answer maximum upto 500 words. Each question carries 16 marks.

- Explain the detail the Historic movement of "Quality" since inspection to total quality management.
- 11) Write short notes on :-
  - (i) Six sigma implementation process.
  - (ii) Supply chain management.

- 12) A bill of material is desired for a product (Z 100) that is made up of a base (A 10), two springs (B 11) and four clamps (C 20). The base is assembled from one clamp (C 20) and two housing (D 21). Each clamp has one handle (E 30) and each housing has two bearings (F 31) and one shaft (G 32).
  - (i) Design a product structure tree that includes the level coding information.
  - (ii) Show data in the form of an indented bill of material.
- 13) Name various management tools used in total quality management. Explain each of them with suitable example.