



**CII Institute of Logistics**  
PGDSCM & Certificate Programs  
Semester-end Examination – June 2009

**Total Quality Management**

Time: Three Hours

Marks: 100

**Part A**

Answer all questions

(20 x 1 = 20 Marks)

1. Quality Management is only a functional activity restricted to a few departments like production and Materials TRUE / FALSE
2. Taguchi maintained that the manufacturing based definition of quality as 'conformance to specialization limits' is inherently correct. TRUE / FALSE
3. Fishbone diagram deals with skills, style, staff, strategy and structure TRUE / FALSE
4. Variations due to amicable causes do not tend to distract the normal distribution curve for parts produced by any process. TRUE / FALSE
5. Producers Risk is the probability of acceptance of a lot whose proportion defective to equal to the reject able quality level TRUE / FALSE
6. Six Sigma is a statistical measure that says that in a well managed process be it manufacturing or service only 1.6 defects per million can be encountered. TRUE / FALSE
7. The acronym 'DMAIC; stands for Desire – Monitor – Act – Investigate – Create TRUE / FALSE.
8. Green Belts are typically leaders at the highest level in the echelon of Technical Expertise TRUE / FALSE
9. The principles of ISO 9000 are applicable only when an organisation employs 500 people. This is what is known as ISO 9000 limiting factor. TRUE / FALSE
10. A particular hospital may like to differentiate itself by advertising its "rating" in a speciality such as cardiac care, with an implied guarantee of better results, which will lead to manufacturing based health care experience. TRUE / FALSE
11. TQM is essentially a quick fix solution and mostly restricted to the shop floor. TRUE / FALSE

12. Demand philosophy does not take into consideration the service process. TRUE / FALSE
13. Unlike Deming, Juran did not propose any major cultural changes in the organisation but sought to improve quality within the system familiar to US managers. TRUE / FALSE
14. Taguchi offered a method of measuring the monetary loss resulting from the creation of products services that do not confer to quality standards. TRUE / FALSE
15. Reliability is the willingness to help customers and provide prompt service. TRUE / FALSE
16. Quality strategy will ideally drive the development of a structure in order to carry it out. TRUE / FALSE
17. The objective of quality improvement progress is to develop an approach which ensures goods, and services are produced which meet customer requirements at any cost. TRUE / FALSE
18. Fishbone diagram is also known as cause and effect diagram. TRUE / FALSE
19. TQM focuses as continuous improvement in all operations within a process while Six sigma focuses a continuous improvement in individual operations with un related. TRUE / FALSE
20. ISO 9004 deals with the model for quality assurance in final inspection and tests TRUE / FALSE

**Part B**

Answer any FOUR

Marks: 4 x 10 =40

1. What does ISO stand for? How does the series work? What does ISO 9000 Registration mean?
2. Explain clearly Dr. Juran's Quality Trio logy?
3. Write short notes on the following:
  - A. Role of effective communication in TQM.
  - B. Departmental purpose analysis.
  - C. TQM.
4. Take a typical service as an example and substantiate its customer service dimensions.
5. Explain in details the several phases of Benchmarking process.
6. Discuss at least 5 important Management Planning Tools? To what extend you use them in your organisation?

## Part C

### Case Study

Answer all FOUR

Marks: 4 x 10 =40

In April 2003, Quality Medicare Centre, working with Manipal Hospitals and 28 other hospitals set out to benchmark its admission process. They selected the admission procedure because it appeared complex to customers. The quality team decided to do benchmarking in two phases: During Phase 1, it would compare its admission procedure with the best in the healthcare, in Phase 2, it would look outside the industry for ideas.

The team made some revealing discoveries during phase 1. Quality Medicare Centre's patients, for instance, had to sign an average of 12 forms to be admitted. Some of the best hospitals managed to keep that number to two; a few kept their average even below that. Patients had six to eight interactions with the staff (representing a problem the study team called every one asking the patient the same questions); the best practices needed only three interactions, sometimes only one.

Some new practices at Quality Medicare Centre that have come out of this benchmarking phase including the following:

- Verifying patient's insurance before the date of admission.
- Training the admitting and finance staff to work out payment plans together.
- Cutting the number of inspections given a new chart from four, five or more per day to one or two.
- Naming a quality team to work on reducing the number of forms and questions.

The business and admitting offices consider the following practices.

1. Creating 24 – hour financial hotline or even offering business services 24 – hours a day.
2. Linking surgery scheduling and pre – admission scheduling by computer.
3. Gathering insurance information by linking doctor's offices with both the admitting and billing offices of Quality Medicare Centre.

The team hopes to implement improvements throughout all Quality Medicare Centre's business centres. In September 2003, the Healthcare forum released the results of Phase 1 of the best practices in patient hospital admitting study. In October, the Helath Care Forum met to begin phase 2.

Looking outside healthcare Quality Medicare Centre its practices with those of Indian Airlines, Ramada Hotels, Taj Hotels, KSRTC, and LIC. Among some early observations, it was noticed that Ramada Hotels pre – register many customers, escorting them from their cab directly to their rooms and one of the best practices that was decided to be implemented was to be directly admit the patients and do the procedures later.

### QUESTIONS

1. Will this process improve patient's perceived quality?
2. According to you, what are variables that should be looked outside the industry for benchmarking?
3. What are the advantages and shortcomings of using benchmarking?
4. What do you infer from the best practices identified in this case?

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