



#### SNS COLLEGE OF ENGINEERING

Kurumbapalayam (Po), Coimbatore – 641 107

#### **An Autonomous Institution**

Accredited by NAAC – UGC with 'A' Grade Approved by AICTE, New Delhi & Affiliated to Anna University, Chennai

#### DEPARTMENT OF COMPUTER SCIENCE AND TECHNOLOGY

COURSE NAME: 190E114 -TOTAL QUALITY MANAGEMENT

III YEAR / VI SEMESTER

**Unit 1- Introduction**Basic concepts of TQM







### **Basic Concepts of TQM**







## TQM six basic Concepts



- Top Management commitment to TQM principles and methods & long term Quality plans for the Organization
- 2. Focus on customers internal & external
- 3. Effective involvement and utilization of entire work force (Employee Involvement) Quality at all levels of the work force.-
- 4. Continuous improvement of the production/business process.
- 5. Treating suppliers as partners
- 6. Establish performance measures for the processes.





## 1. Top Management Commitment

- Top management should participate and completely involve in total quality programme
- Top management must realize importance of quality
- Quality is responsibility of everybody, but ultimate responsibility is CEO
- Management should participate in quality improvement teams
- Involvement and commitment meetings,
- Quality excellence becomes part of business strategy
- Lead in the implementation process
- TQM must be communicated to all the people in the organization
- Participate in quality program, develop quality council, direct participation





#### 2. Focus on customers - Customer Satisfaction

- who is the customer internal and external, voice of the customer, do it right first time and every time.
- Achieving customer satisfaction is the heart of TQM
- Customer is always right in Japan customer is "King"
- Customer expectations constantly changing 10 years ago acceptable, now not any more!
- Must give customers a quality product or service, reasonable price, on-time delivery, and outstanding service
- Need to continually examine the quality systems and practices to be responsive to ever – changing needs, requirements and expectations – Retain and Win new customers





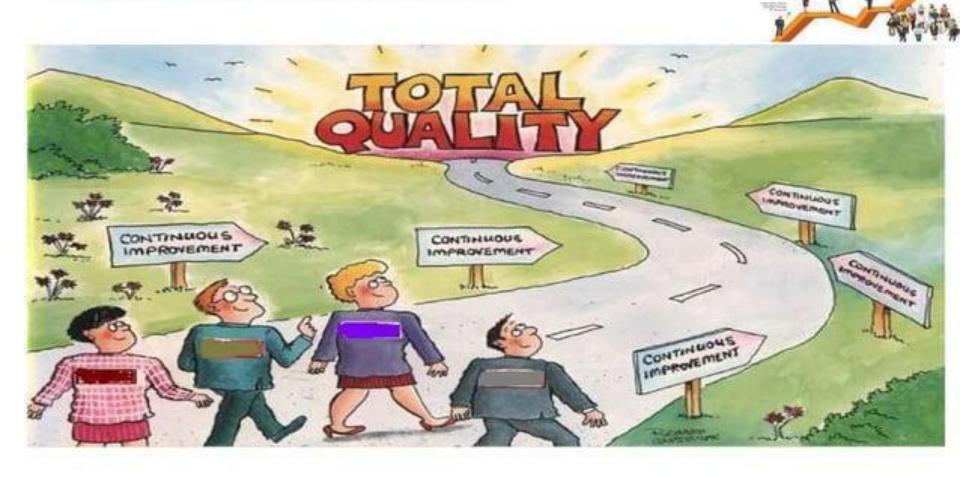
# 3. Effective involvement and utilization of entire work force (Employee Involvement)

- People most important resource/asset
- Quality comes from people
- Deming 15% operator errors, 85% management system
- Recognize that each person -responsible for quality
- Project teams Quality Control Circles (QCC), QIT
- Education and training life long, continuous both knowledge and skills
- Motivational programmes, incentive schemes
- Conducive work culture, right attitude, commitment
- Quality improvement skill effectively participate on quality teams





## 4 - Continuous Process Improvement







#### 4 - Continuous Process Improvement

- The quest for quality is a never-ending process in which people are continuously working to improve the performance, speed and number of features of the product or service.
- Continuous improvement means that small, incremental improvement that occurs on a regular basis will eventually add up to vast improvement in quality.
- TQM is the management process used to make continuous improvements to all functions.
- TQM represents an ongoing, continuous commitment to improvement.
- Better way of doing things -better use of companys total quality resource more productive
- For this purpose various quality tools and techniques may be used





## 4 - Continuous Process Improvement

- View all work as process production and business
- Process purchasing, design, invoicing, etc.
- Inputs PROCESS outputs
- Process improvement increased customer satisfaction
- Improvement 5 ways;
- Reduce resources, Reduce errors, Meet expectations of downstream customers,
  Make process safer, make process more satisfying to the person doing



#### 5- Supplier Partnership



- Supplier influencing the company's quality partnering relationship should be developed
- 40% product cost comes from purchased materials, therefore Supplier Quality
  Management important
- no business exists without suppliers.
- Substantial portion quality problems from suppliers
- Need partnership to achieve quality improvement long-term purchase contract





#### 6 - Performance Measures

- Effective management requires measuring
- Use a baseline, to identify potential projects, to asses results from improvement
- E.g. Production measures defects per million, inventory turns, on-time delivery
- Service billing errors, sales, activity times
- Customer Satisfaction
- Methods for measuring
- Cost of poor quality





- Quantitative data are necessary to measure the continuous quality improvement activity
- · Performance measure
- Productivity
- Sales turn over
- · Absenteeism's
- Percent non-conforming
- Customer satisfaction





- Award Models (MBNQA)
- Benchmarking grade to competitors, or best practice
- Statistical measures control charts, Cpk
- Certifications
  - ISO 9000:2000 Quality Mgt System
  - ISO 14000 Environmental Mgt System,
  - Underwriters Lab (UL), GMP
  - QS 9000, ISO/TS 16949





#### Key points

- Top Management commitment Involvement and commitment
- Focus on customers internal & external King
- Employee Involvement Recognize, Motivation, commitment
- Continuous improvement- small, incremental improvement, regular basis
- Treating suppliers as partners no business exists without suppliers
- performance measures -Effective management requires measuring





## **THANK YOU**