

March - April 2015

ANNOUNCED  
with  
EVOLUTION PROGRAM  
**RECENT ADVANCES IN  
QIN NETWORK MANAGEMENT**  
16<sup>th</sup> - 18<sup>th</sup> April 2015  
Organized by  
Dept of Mechanical Engineering  
SIES COLLEGE

# Q - ZINE

BI MONTHLY NEWS LETTER

Chennai Branch

Dedicated to Quality

## National Institution for Quality & Reliability

Round Table House, First Floor,

No.80, Nungambakkam High Road, Chennai 600 034.

Phone: 044 28271530 | Email: niqrchennai@gmail.com | Website:www.niqr.in

## *From Chairman...*

**Hearty wishes,**

A new financial year has just begun; it is customary to take stock of what happened in the past year and to set targets for the current year. It is imperative this practice is not limited to just financial goals, but is extended to other areas of the organisation.

We at NIQR did this exercise in the first week of April to redefine our focus on deliverables to the members of NIQR and to the Industry, by having a brain storming session, 'Leap to next Orbit', and SWOT analysis on functional areas and at the end of the session the team concluded on action points to be focused in the coming year. I take this opportunity to thank all the members who participated in the session to take NIQR to the next level.

With the committed teams and the focus areas redefined, I assure on behalf of the team NIQR, the days ahead will bring more value to all the members.



With warm regards,  
S.Rajasekaran

---

## *From Secretary...*

**Warm wishes and a Happy Tamil New Year Manmadha,**

Hope all of you would have celebrated Manmadha, the Tamil New Year with all pomp and gaiety. The year Manmadha is supposed to bless the country with more of manufacturing activities. Let our Prime Minister's Make in India movement get a fillip in this year.

At NIQR Chennai Chapter, we were able to fulfill majority of our wishes. The Newsletter and Evening Lectures were on dot.

With a view to serve the student community better and rejuvenate the student chapters, we organised a meeting with coordinators of all Student Chapters. The deliberations were very much in line with our vision. We have organised 7 guest lectures in 4 institutions during 2015.

The NIQR website has been updated and we are confident the visits will increase in days to come. In this issue, you will see a good number of articles; your timely feedback will definitely put us in the right track to serve you better.



With kind regards,  
C V GOWRI SANKAR



## NIQR welcomes the new members who joined during **Mar-Apr 2015** Individual Life Members

Mr. A. T. Muthukumar - Printfaast, Chennai

Mr. S. Sakthivel - TAFE, Chennai

The total no. of members who have joined the NIQR family from April 2014 is 109.

Individual Annual Members - 11  
Individual Life Members - 44

Institution / Company Members - 2  
Individual Student Members - 52

### Chennai Branch Activities

#### Lecture Meeting held on 28<sup>th</sup> Feb 2015 by

#### Dr. B. ArunKumar

The Evening Lecture for the month of February was organised on 28<sup>th</sup> February 2015 at NIQR Conference Hall, Nungambakkam.

Dr. B. ArunKumar, Dental Surgeon, Arun's Dental Art, Chennai was the speaker and the topic was "STANDARDISATION OF QUALITY IN DENTAL HEALTH CARE - Challenges and Opportunities". Mr. S. Rajasekaran, NIQR

Chennai Brach Chairman presided over the session and Mr. C V Gowri Sankar, NIQR Chennai Branch Secretary introduced the speaker.

Dr. B. ArunKumar started with the current scenario of dental care in India and potential opportunities in the dental care field and the need for standards and methods in the field of Dental Care. Elaborating about lot of recent developments in Dental Health Care, he emphasized on the need for standardization of dental health care in terms of delivery, opportunities present and challenges faced.

He also mentioned about the Occupational Health and Safety of Dentist / Staffs due to hazards involved while handling X-ray, Mercury base compounds etc. and explained about the prevailing standards and procedures in the



Dr B ArunKumar, Dental Surgeon, specialized in Prosthodontics and Implantology with an experience of 17 years, is managing a successful dental practice, Arun's Dental Art at 4 locations in Chennai.

Art at 4 locations in Chennai.



industry. He rounded off with good tooth keeping methods including type of paste used, avoidance of abrasives etc. The Q&A session was lively with the audience wanting to know more about standards and procedures in Dental Health Care in India.

## Lecture Meeting held on 21st Mar 2015 by Dr. A Sanjeeva Rao



### Dr A Sanjeeva Rao

He is Past National President NIQR and currently Director QCFI. He has associated with Quality Management and Quality Assurance for the last 45 years. He is a recipient of many Outstanding Contribution Awards. He has trained over 25000 people in topics like TQM, Six Sigma, DOE, SPC, etc. He has authored a few books on Cost of Quality, Benchmarking, QC Tools and Six Sigma.

The Evening Lecture for the month of March was organised on 21st March 2015 at NIQR Conference Hall, Nungambakkam. Dr. A Sanjeeva Rao, NIQR Past National President was the speaker and the topic was "TQM vs Six Sigma". Mr. S. Rajasekaran, NIQR Chennai Branch Chairman presided over the session and Mr. C V Gowri Sankar, NIQR Chennai Branch Secretary introduced the speaker.

After a brief reference to 'What is' and 'Why' TQM as well as Six Sigma, Dr A S Rao, dwelt at length on the frame work for implementing them. After explaining the TQM principles, he elaborated on the organisation of Six Sigma with special mention about the Six Ingredients. Finally he illustrated with a matrix comparison and critical differences in implementation between the two methodologies and the benefits to sustain business performances to continuously satisfy all the stakeholders. The audience made the session lively by high level of interaction for more than half an hour.



Your Solution partner for Force,  
Torque & Pressure - Test,  
Measurement & Calibration  
systems Since 1986.



#### Our Standard & Custom built Products are:

Force, Torque & Pressure sensors and Measuring devices;  
Spring Testers; Torque Tool Testers;  
Crimp testers Solutions; Force & Torque Testing Systems;  
Calibration & Testing Systems; Automotive Testing Systems;  
Bottle Cap Torque Tool Testers; Motor Testing Solutions;  
Defense Testing Solutions; Aerospace Testing Solutions;

NABL Accredited Calibration lab  
for Force, Torque, Mass,  
Volume, Density, Speed &  
Angle



#### Contact us today

[marketing@sushmaindustries.com](mailto:marketing@sushmaindustries.com)

Plot No. 18E, Block-B, 1st 'C' Main Road,

2nd Phase, Peenya Industrial Area,

Peenya, Bangalore-560058.INDIA.

Tel/ Fax: +91-80-28397463 | 28395273

[www.sushmaindustries.com](http://www.sushmaindustries.com)

## NIQR Students Chapter

NIQR Chennai branch organised a meeting with coordinators of all Student Chapters on 12<sup>th</sup> March, 2015 in NIQR Conference Hall. The meeting was attended by 7 representatives from 4 institutions and 5 NIQR officials.

Mr. S Rajasekaran, Chairman, NIQR Chennai Branch welcomed gathering and wanted the institutions to make use of NIQR services in enhancing the knowledge level of students.

Mr. C V Gowri Sankar, Secretary, NIQR Chennai Branch outlined the services NIQR is offering for student chapters now and on the anvil.

The Institution representatives listed out their requirements and there was good interaction. Some of the points agreed include:

- Q Guest lectures
- Q One day workshop
- Q Student convention on the lines of national convention
- Q TQM certification course along with MSME
- Q Brochure about NIQR to be distributed to students
- Q Starting of Quality Circles and nurturing them

Mr. G Rangarajan, Secretary, NIQR HQ summed up that NIQR will look into all the above and requested the institutions to send their specific requirements so that NIQR can organise them.

Mr. C V Gowri Sankar proposed vote of thanks to all the members present.

With Best Compliments From

Guiding For Excellence

**SANJEEV QUALITY CONSULTANTS**

38/8, Raj Paris Apartments, Neelakantametha Street  
T.NAGAR, CHENNAI - 600017.  
PHONE : 24343124, MOBILE : 93805 15046  
E-MAIL : asrao\_sqc@yahoo.com

**Dr.A.SANJEEVA RAO**  
Executive Director

Specialists in TQM, Six Sigma & International  
Quality & Environment Management Systems

Consultancy, In house & External  
Training Programmes will be conducted

1. TQM (Total Quality Management)	6. SIX SIGMA Process Improvements
2. SQC (Statistical Quality Control)	7. ISO 9001 & 14001 Awareness
3. DOE (Design of Experiments)	8. QMS & EMS Internal Auditor Skills
4. QCC (Quality Control Circles)	9. ISO/TS 16949 Awareness
5. SS & Kalzen	10. World Class Manufacturing Practices

## NIQR Student Chapter-Rajalakshmi Engineering College Lecture on Automotive Materials

Department of Automobile Engineering, Rajalakshmi Engineering College, Thandalam organised a guest lecture for the Automobile Engineering Students on 31<sup>st</sup> January 2015. The topic was `Automotive Materials` and Dr. P. Ramesh Co-opted member of NIQR HQ was the guest lecturer. About 70 students of IV & V Semester Automobile Engineering and faculties attended the program.

Dr. K. Bhaskar, Professor & Head, Automobile Engineering introduced the speaker to the audience. Dr. P. Ramesh gave an overview of materials used in auto industry covering various topics:

- Q Materials used in automotive application: metals, plastics, rubbers, etc.
- Q Recent trends in automotive materials
- Q Light weight concepts and materials - Mg Castings, High performance engineering plastics, Carbon fibre reinforced plastics to replace steels
- Q Composites for automotive application
- Q New generation materials such as Micro alloyed steels, Carbon fibres, Graphenes, Conductive plastics, bio plastics, TPE`s, Flame retardant Polymers etc
- Q Hazardous automotive materials and regulations & directives
- Q powder metallurgy
- Q heat treatment processes

The students were very interactive and the Q & A session prolonged for 20 minutes. Dr. K. Bhaskar proposed a vote of thanks and wanted frequent programs from NIQR



## NIQR Student Chapter - Vels University Lecture on Poka Yoke

NIQR Student Chapter of Vels University, Pallavaram organised a guest lecture for the students of mechanical engineering department. Mr. C V Gowri Sankar, Secretary NIQR Chennai Branch delivered a lecture on Poka Yoke on Monday 9<sup>th</sup> March 2015.

Mr. T. Vinod Kumar, Assistant Professor, Mechanical Engineering introduced the speaker to the audience. About 120 students of Mechanical Engineering and faculty members attended the program.

Mr. C V Gowri Sankar gave an overview of various practices followed under the TQM umbrella in Japanese industries. Poka Yoke or Mistake Proofing is one of the important practices followed in lean manufacturing. He explained the necessity for Poka Yoke in mass production with a few exercises and the concept of war on waste in lean manufacturing. He briefed the audience about the Ten Types of Human Mistakes and various errors possible during mass production. He then explained the 3 methods of Poka Yoke, namely the contact method, the fixed-value (or constant number) method & the motion - step (or sequence) method.

The difference between warning Poka Yoke and control Poka Yoke was explained with examples. In the end he gave a lot of examples in real life situation and the audience responded with lot of interaction. The students and faculty members appreciated the lecture and expressed their desire to have lectures on TQM concepts during the next year.



---

## NIQR Student Chapter - Dr MGR University Lecture on Corporate Social Responsibility

NIQR Student Chapter of Faculty of Management Studies, Dr. MGR University, Maduravoyal had organised a guest lecture for their MBA students. Mr. K N Krishnamurthy delivered a lecture on 'Corporate Social Responsibility' on Wednesday, 25<sup>th</sup> March 2015. At the outset, Mr. C V Gowri Sankar, Secretary NIQR Chennai Branch gave an overview of the activities of NIQR and explained in detail the programs NIQR can organise for student chapters. One of the final year students introduced the speaker to the audience. About 150 students of 1<sup>st</sup> & 2<sup>nd</sup> year MBA and faculty attended the program.

Mr. K N Krishnamurthy outlined the necessity of CSR for inclusive development within the organisation for raising the level of employees and outside for society at large. He elaborated on the UN Millennium development goal and the human development index for every country wherein India stood a distant 124<sup>th</sup> out of 200 countries in 2011. He dwelt on few examples of CSR activities of large corporates; Ashok Leyland's Driver Training Institute at Namakkal and TISCO's development of townships. After explaining the Indian Law of minimum 2% of profit of organisations to be spent on CSR, he listed for the benefit of the audience various CSR initiatives including the latest 'SWACHH BHARATH' and 'MAKE IN INDIA'.



## NIQR Student Chapter - Dr MGR University

### Lecture on Supply Chain Management

Faculty of Management Studies, Dr. MGR University, Maduravoyal had organised an international Conference on TQM on Friday 27<sup>th</sup> March 2015 and NIQR Student Chapter arranged a lecture on Supply Chain management as part of it. Dr. R Srinivasan, Treasurer, NIQR-HQ gave a guest lecture on SCM for their MBA students. About 110 students of 1<sup>st</sup> & 2<sup>nd</sup> year MBA students and faculty attended the program. One of the final year students introduced the speaker to the audience.

Dr. R Srinivasan started explaining the importance of JIT in today's Lean Manufacturing. He gave lot of examples of how SCM is dynamic and how they evolve and change over time. He elaborated on the ways to ensure SCM is able to meet challenges through e-commerce. He dwelt at length about the emergence of backward integration and forward integration to help the organisations to be more profitable in the competitive world. His examples on the above drew lot of lengthy interactions from the students. He also explained the strategic, tactical and operating issues involved with SCM. He made the session very interactive with examples from real time manufacturing.

## NIQR Student Chapter - Rajalakshmi Engineering College

### Lecture on Supply Chain Management

Department of Mechanical Engineering, Rajalakshmi Engineering College, Thandalam organised a guest lecture for the Mechanical Engineering Faculties as part of the 'AICTE sponsored FACULTY DEVELOPMENT PROGRAMME' on 13th April 2015. The topic was 'Supply Chain Management' and Mr. S. Rajasekaran, Chairman NIQR Chennai Branch was the guest lecturer. About 40 Faculty Members of Mechanical Engineering attended the program.

Dr. S. P. Srinivasan, Prof. & HOD of Mechanical Engineering introduced the speaker to the audience. Mr. S. Rajasekaran gave an overview of Supply Chain Management in an Auto Industry with plenty of real time examples.



- Q Supply chain categories
- Q Supply chain Internal Material flow
- Q Supply chain external Material flow
- Q Requirements of Internal and External supply chain
- Q Supply chain advantages
- Q Supply chain challenges
- Q Future ahead

The Faculties were very interactive and the Q & A session prolonged for 1 hour and 30 minutes. The faculty received some excellent comments. Some of them are: Dr C B Ragothaman, Head/MBA “excellent real time case study on ground realities”. Dr R Baskar, Head / Automobile “I was really thrilled to listen about SCM (what happens in industry) & JIT by the speaker. This lecture gave very good insight about SCM/ JIT”. Mr. Sankar- Dean of Management science proposed vote of thanks and requested frequent programs from NIQR.

## Kudos to NIQRian

NIQR congratulates Mr. S. Kumar, Executive Committee Member NIQR Chennai Branch and Head - Operations, Rane Madras Ltd., for having completed MBA from Indian Institute of Management, Kozhikode in April 2015.



## Head Quarters Activities

### NIQR-Leap to Next Orbit

NIQR Head Quarters organised a brainstorming session on 5th April 2015 at NIQR Conference Hall with the theme of NIQR-Leap to Next Orbit. The 18 participants formed 4 groups and did a SWOT analysis on the theme. After good deliberations, 9 ideas were shortlisted for action with focus areas and activities. Nine champions were selected for each idea and they will form teams to take forward the ideas.



The nine focus areas are:

- Reaching Out to Other Segments
- Connect with Branches
- Bridge Gap between Plan & Execution
- Collaboration with Industry Association
- Collaboration with Knowledge Bodies (ASQ/MIQ)
- Student Chapters
- Scaling up operations
- Leveraging IT
- Enhancing Awards

### Six Sigma Black Belt Workshop in Sesa Sterlite Copper, Tuticorin

Last issue, we have covered the Phase I of Six Sigma Black Belt workshop organized by NIQR, Head quarters in M/S Sesa Sterlite, Tuticorin.

**II Phase of training:** The second phase of training (23rd to 26th March 2015) started with recapping Phase I learnings and feedback on Phase I assignments submitted by the participants. Then phase II portions that is Analyse, Improve, and Control cycle concepts were taught to the participants with lot of hands-on-exercises and case studies. On the 3rd day evening, participants presented their progress on their projects selected for this certification course showing good progress. The faculties suggested to the participants to apply high end tools learned in the program at appropriate places. Participants will work on their projects based on the guidelines provided and present their projects in the next visit. Phase III of the workshop is scheduled on 17th & 18th Apr 2015.



## Workplace Safety

### Introduction

WHS (**Workplace Health and Safety**) is an area concerned with safety, health and welfare of people engaged in work. OHS (occupational health and safety) is safe and healthy work environment; it should also protect co-workers, family members, employers, customers, and many others who might be affected by the workplace environment. The goal is to maintain safe and secure workplace which in turn keeps the worker safe. Employers have legal responsibilities to ensure a safe and healthy workplace and every employee has the rights and responsibilities for their wellbeing as well as colleagues, company, environment and nation.



## Workplace Hazards

Liberalization of world trade, rapid technological progress, rapid developments in transport and communication, shifting patterns of employment, changes in work organization practices, different employment patterns of men and women, size, structure and life cycle of enterprises usually generate new patterns of hazard and risks. Demographic changes, migration of people, and the consequent pressure on global environment can also affect health and safety in the world of work.

World Health Organization (WHO) indicates that overall occupational accident and disease rates are slowly declining in most industrialized countries, but increasing in developing and industrializing countries.

## Workplace Health and Safety System

Three types of Safety Systems generally adopted at workplace:

- Human dependant
- Systems dependant
- Engineering/Science/Technology dependant

First two are simple and easy to adopt/implement in work place when compared to last one which requires expensive resources some times.

## ABC of safety at workplace

ABC of safety at workplace are Attitude, Behaviour & Culture. A strong health and safety workplace culture consists of:

### Attitudes

Attitudes influence the behaviour of the person in the workplace. Workplace safety attitudes refer to the employee tendency to respond positively or negatively towards a safety goal, idea, plan, procedure, prevention or situation.

Positive workplace safety attitudes are essential for an accident free work environment that ensures higher efficiency, best quality, raises employee morale, business profit and goodwill.

Negative workplace safety attitude increases cost of production, and reduces employee safety, morale, quality, profitability and business goodwill. Good workplace safety attitudes are represented by attentiveness, eagerness, alertness, carefulness, task focused, team-oriented and seriousness. Bad workplace safety attitudes are represented by emotional acts, tiredness, risk-taking, recklessness, selfishness and carelessness.

### Behaviour

Human behaviour is dynamic, and influenced by attitudes, thoughts and the context in which they exist. Several behaviours at work can have an effect on a worker's health and safety. Mental health can be affected by workplace behaviours such as conflict, violence, aggression, and stress.

### Culture

A strong health and safety workplace culture consists of

- **Competence:** Appropriate knowledge and training, systems for responding to events.
- **Commitment:** Demonstration by the employer of leadership on safety, appropriate policies and procedures to protect workers, low tolerance for poor health and safety practices, insistence upon full compliance.
- **Capacity:** An adequate resource for preventing injuries, good systems, strong leadership by senior executives and other managers set the tone and establish a corporate culture that nurtures IRS.

## Types of Workplace Hazards

Different types of hazards can be seen in the work place and it depends on nature of business and work environment and are classified as Physical, Biological, Chemical, Electrical, Ergonomics, Radiation, Psychosocial, Noise, Dust and Waste etc.

### Physical Hazard

Involves work environments, equipments and practices which may expose people to physical hazard

### Biological Hazard

Biological hazards can pose the potential risk of infectious diseases. When working with biological agents knowledge of appropriate safety protocols and procedures are essential.

### Chemical Hazard

Prolonged exposure to hazardous acid/alkalis and inhaling Lead (Pb) based solder fumes, Paint solvent fumes & radioactive materials cause serious health issues.

### Electrical Hazard

Electrical hazards are due to poor electrical wires, connections which lead to short circuits and cause damage to environment, people and the property. Root causes for many fire accidents are due to electrical short-circuits.

### Radiation Hazard

Radiation hazards are due to harmful radiation sources such as Ultra Violet (UV) rays, X-Ray, Gamma Rays which are very harmful and cause cancer and other associated diseases.

### Waste Management Hazard

Handling and disposal of potentially hazardous waste materials such as chemicals, biological, radioactive materials and effluents can cause potential danger to people. Knowledge on waste materials and clear procedure for handling and disposal of waste material are to be instituted.

### Psychosocial Hazard

In recent years, psychosocial hazards related to psychological health of the workers are increasing. This is linked to occupational stress, work place violence etc., that are becoming major challenges to occupational health and safety.

## Functions of occupational health and safety in the workplace are to:

- Identify and assess the risks from health hazards in the workplace.
- Watch for factors in the work environment and working practices that may affect workers health, such as sanitary installations, canteens and housing provided by the employer.
- Advise on work planning and organization, including workplace design and the choice, maintenance and condition of machinery, and other equipment and substance used in work.
- Participate in the development of programmes for the improvement of work practices.
- Collaborate in testing new equipment and evaluating its health aspects, advice on occupational health, safety and hygiene, and on ergonomics.
- Regularly monitor workers' health
- Contribute to vocational rehabilitation.
- Collaborate in providing training and education in occupational health, hygiene, and ergonomics.
- Organize first aid and emergency treatment.
- Participate in the analysis of occupational accidents and diseases.
- Institute use of personal protective equipments (PPE)
- Institute Emergency preparedness programme including training on Fire fighting equipments

## Conclusion

Creating a safe work environment is critical to the success of every business, and is one of the best ways to retain staff and maximize productivity. Organisations must be committed to promoting and implementing the highest practicable standards of occupational health and safety to ensure compliance with relevant legislation, industry standards and best practices for the categories of work. A sustainable workplace health and safety culture needs a strong commitment by all the workplace parties to prevent injuries and illness and to reduce risk, because **workplace safety is EVERYONE'S business.**

## Reference

- Fundamental Principles of Occupational Health and Safety. Second edition. by Benjamin O. ALI
- Wikipedia
- University of Western Australia – [www.safety.uwa.edu.au](http://www.safety.uwa.edu.au)
- Safeopedia.com posted by Mr. Scott Cothbert
- [www.commerce.wa.gov.au](http://www.commerce.wa.gov.au)

Compiled by  
Dr. P. Ramesh, Head – Materials Lab, Lucas-TVS Ltd & ECM, NIQR HQ

## Know the Quality Gurus - 2

**Dr. W A Shewhart** (1891-1967)

### The Grandfather of Total Quality Management

Walter Andrew Shewhart was born in New Canton; He attended the University of Illinois receiving bachelors and masters degrees and moved to California where he earned his doctoral degree in physics. After that Shewhart joined the inspection engineering department of the Western Electric Co. in Hawthorne, IL. Western Electric manufactured telephone hardware for Bell Telephone Co.



One of W. Edwards Deming's teachers, he preached the importance of adapting management processes to create profitable situations for both businesses and consumers, promoting the utilization of his own creation the SPC control chart. Dr. Shewhart believed that lack of information greatly hampered the efforts of control and management processes in a production environment. In order to aid a manager in making scientific, efficient, economical decisions, he developed Statistical Process Control methods. He also developed the Shewhart Cycle Learning and Improvement cycle, combining both creative management thinking with statistical analysis. This cycle contains four continuous steps: Plan, Do, Study and Act.

- **Plan:** identify what can be improved and what change is needed
- **Do:** implement the design change
- **Study:** measure and analyse the process or outcome
- **Act:** if the results are not as hoped for or want to improve further

These steps (commonly referred to as the PDSA cycle), Dr. Shewhart believed, ultimately lead to total quality improvement. Dr. Shewhart's contribution in the areas are:

- Design and development of Reliability in the product design

- System to identify and reduce variation in the manufacturing process. He coined the words Assignable cause and Chance cause.
- Propagating the Quality Systems from Manufacturing process to entire business process
- Wrote a book on Statistical Method from the Viewpoint of Quality Control and gained recognition in the statistical community.

Complied by  
**Mr. S. Kumar, ECM & Head, Operations, Rane Madras Ltd., Chennai**

## Strategic Quality Framework - 2

### How to measure the Quality of Product / Services?

All the companies have tried to upgrade the product quality and services through various programs like cost of quality, reliability engineering, First time right etc, using 7 QC tools and Design of Experiments. But some of the organizations have failed because of lack of seriousness and perceived these programs as defensive measures to remove defects. So the concept called Strategic Quality Framework (SQF) emerged. Dr. Garvin developed this framework of 8 dimensions to measure the quality of product / services.

- Performance
- Features
- Reliability
- Conformance
- Durability
- Serviceability
- Aesthetics
- Perceived Quality

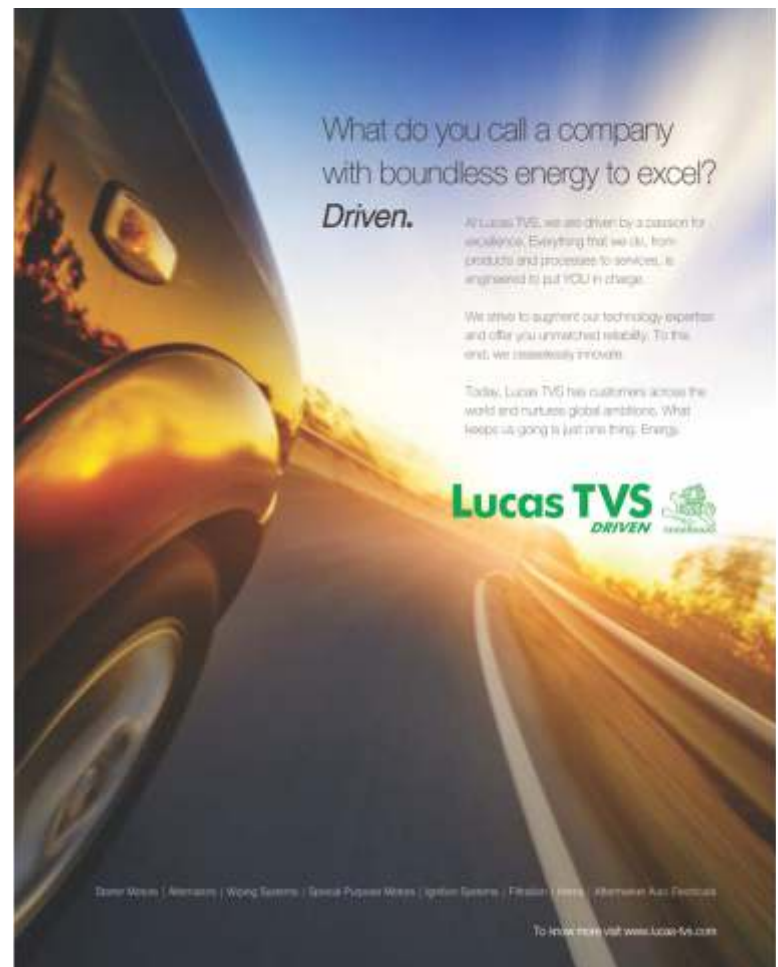
In the previous newsletter, we have studied the importance of the Performance dimension. In this issue, let us understand the **Features** dimension

Features refer to a product's characteristics that supplement the product Performance and Service functions. This also helps to enhance the appeal of the product or services.

For example

- Automatic tuner in color TV,
- Charging plug points in trains
- Free Cool drink on a Plane,
- TV/DVD in long distance bus
- Sunroofs on Cars,
- GPS navigation system on Cars
- Multiple paper trays in a photo copying machine
- Pickup car booking along with Ticket reservation in IRCTC
- Car booking, tour guide, complimentary breakfast in hospitality industries
- Mobile phone business mostly depends on the features which add in to the product.

This is also called secondary function; however it is very difficult to differentiate it because today's secondary function will become primary function tomorrow depending on customer expectations. Features also involve the objective and measurable attributes.



Complied by  
**Mr. S. Kumar, ECM & Head, Operations, Rane Madras Ltd., Chennai**

## What it is? - 2

### SWOT

The expansion is Strength Weakness Opportunity and Threat. This is one of the Strategic Management tools used to understand organization's capability with respect to the competitors.

SWOT analysis identifies organization's existing Strengths and Weakness (both are internal attributes) and emerging Opportunities and worrisome Threats (external attributes).

A well-conducted SWOT analysis helps to summarize the information into a succinct list that helps executive team understand the key issues that the organization contend with when formulating strategy. For example, Strength can be leveraged to pursue opportunities and to avoid threats, the management team can be alerted to internal weakness and external threats that need to be overcome by the strategy.

### Example:

If we do the SWOT for medium size restaurant situated at heart of the town, a typical SWOT analysis will be:

#### Strength

- Gained customer confidence on hygiene and taste
- Able to provide large varieties of food items
- Easy accessibility for the customers
- Known for its Filter Coffee and Ravadosa.
- Experienced and competent management.

#### Weakness

- Service time is high compared to competitors
- Not able to compete with the unorganized players due to Price
- No parking place for four wheelers

#### Opportunity

- Shopping mall and IT companies are coming up
- Surrounding Govt offices looking for contract to provide lunch
- There is no budgetary restaurant nearby.

#### Threat

- Continuous price increases in groceries & vegetables.
- Govt opened low cost restaurants
- High attrition rate of employees
- Well known restaurant group planning to set-up facility

After collecting all the relevant information, the list can be prioritized to reflect each element's overall impact to the organization. Considering the information, the restaurant may initiate the following strategic actions.

- Can start a low budget division to counter the Govt operated restaurants and be able to compete with unorganized players.
- Leverage its strength of Filter Coffee and Ravadosa by opening fast food section only for these items.
- To exploit the opportunities, can have contractual agreements with IT companies and Govt Offices to increase the sales.

Complied by

Mr. S. Kumar, ECM & Head, Operations, Rane Madras Ltd., Chennai

## Micro Approach to Macro “Make-in-India” Movement

Shop floor personnel from MSME Industries made a presentation on the theme “Make-in-Ambattur Industrial Estate”, recently. This triggered a thought of micro approach to the mega movement “Make-in-India”. The 'not so educated' operators confidently shared their success stories; in one case productivity grew by 200% and in another turnover doubled in 2 years. Two key success factors attributed by all of them were:

- “Workplace organization”/Daily work management
- Education and empowerment

Make-in-India movement is indirectly asking a question “If China can, why not we?” China is still the “Workshop of the world”. But they may not sustain for long. Mckinsey study claims, China is going to face an acute shortage of highly skilled workers in labour force. The study asserts, by 2020 China would need 23 million more skilled workers than it can actually supply. China has also an ageing population.

Hence the stress is on the availability of skilled/qualified- workers/engineers. India has an edge over China in this respect. Today, in India, about 85% of manufacturing is done in enterprises with less than 50 employees. Hence, the focus should be on developing the skilled workforce in MSME Industries, like Ambattur Industrial Estate.

NIQR can focus on one or two areas of “Make-in-India” agenda like, “Value Chain” creation, Deliberation through workshops in helping such organizations.

*Food for thought from Mr. P. R. Padmanabhan (Life Member-NIQR)*

## Stuffocation

**Do you often feel that you're walking on thin ice and about to explode?**

Just tidy up your house. Clutter in the house leads to anxiety and anger issues that can stress you out, affect your relationships, warn experts

Stuffocation is the feeling you get when you have to fight through piles of stuff you don't use

**“To find that one thing you need”.**

## STAGNANT ENERGY

Overstuffed wardrobes, dishes in the sink, unmopped bathroom floor; are all triggers that send our mind in a tizzy early in the morning. It's a downward spiral from there on. Experts say that clutter is nothing more than just stagnant energy. The sight of unorganised and unused furniture, books and other articles causes a sense of heaviness inside the brain, leading to irritability, anger and tiredness.

Indians are a sentimental lot. We aren't still comfortable with the concept of use-and-throw things like the West. From an old radio to your mother's kitchen blender; from unused remotes to clothes that you wore in your teens, they are all stored even as your cupboard overflows, making the brain feel 'stuffocated'. People suffering from 'Stuffocation' often believe that happiness comes from possessions.

## AFRAID OF EMPTINESS?

“Every physical object around us produces a corresponding effect, either good or bad.

The smallest change in these objects' arrangements can spell the difference between success and failure. Good energy gets stuck due to clutter. Get the stuck `chi' (energy) --within us and around us -flowing again by removing clutter.“

So, how does one learn to get rid of clutter, or understand the importance of clearing junk in our stressed lives? If you notice your partner is sentimentally attached to something, you must never throw it away in his/her absence. Do the `chucking out' activity together“.

Abridged version of article in Times of India 12<sup>th</sup> April 2015

To read full article, go to the following link:

(<http://epaperbeta.timesofindia.com/Article.aspx?eid=31807&articlexml=mind-matters-YOU-ARE-STUFFOCATED-12042015351005>)

## WILL YOU TAKE THE “30-DAY DECLUTTER CHALLENGE”?

On Day 1, you chuck one item, on Day 2, two items, on Day 3, three items and so on... till Day 30. By the end of 30 days, you'll lose a staggering 465 items of household clutter! Take pictures of your clutter everyday, showing all the debris you had filled your home with. The beauty of the 30-day challenge is to give chucking out (which many people find difficult) a sense of purpose.



**INFANT ENGINEERS  
PRIVATE LIMITED**

An ISO / TS 16949 : 2009 Certified Organisation

**Manufacturers of  
Precision Turned Components for  
critical & safety applications like  
Brake, Steering & Suspension.**



Our Customers:



Sundram Fasteners Limited



Works:

F-43, Sipcot Industrial Park,  
Katrambakkam, Sriperumbudur Taluk,  
Kanchipuram District,  
Tamilnadu, India – 602 105.

Phone : 044 42324222/ 044 24795144/5

website: [www.infantengineers.in](http://www.infantengineers.in)

Email: [info@infantengineers.in](mailto:info@infantengineers.in)

## NIQR Chennai Branch

3 day Intensive training Program on  
"Contemporary Shop Floor Management" jointly with Mahindra  
Institute of Quality and Premier Center for Competency  
Training Pvt. Ltd., at Hotel Pleasant Days on 23-25 April 2015



## NIQR Chennai Branch

is planning for a series of training Programmes  
for shop floor associates and first line executives  
in Irungattukkottai industrial belt.

## Evening Guest Lectures

Quality Management in Construction Industry  
Quality Management in Entertainment Field  
Corporate Social Responsibility

## Prof C Y Krishna Murti Memorial Lecture Meeting

in May 2015

## Shri L S N Gupta Memorial Lecture Meeting

in June 2015

## TQM way of thinking

Prof. Yasutoshi Washio's  
interactive Program with NIQRians on

Customer Focus

Quality First

Fact Control

PDCA Cycle

Recurrence Prevention

Respect for People

in May 2015

## National Institution for Quality & Reliability

Chennai Branch Newsletter Jan - Feb 2015

Editorial Committee:

Prof. C. Uthayakumar, EC Member - NIQR Chennai Branch

Mr. C. V. Gowri Sankar, Secretary - NIQR Chennai Branch

Mr. I. Daniel Jeyaraj - Administrative Officer