



Vative Project and Service Options

Which projects will aid your business best?

The following matrix determines project impact on each Lean pillar:

Each project is scored based on pillar impact. 5 – Highest Impact 0 – No Impact		Lean Pillars								
		Process Orientation	Pull Systems	Perfect Quality	Flexibility	Standardise	Transparent Process	Continuous Improvement	Associate Involvement	Total
(Page No.) Projects	(2) Value Stream Mapping	5	2	0	1	2	2	1	2	15
	(3) Lean Business Health Check	1	1	1	1	2	5	4	4	19
	(4) Professional Coaching	0	0	0	0	0	0	2	3	5
	(5) 5S - Workplace Organisation	4	3	2	3	4	5	4	5	30
	(6) Kanban Just In Time	3	5	1	4	3	4	3	3	26
	(7) Layout Planning	5	0	0	3	3	3	3	2	19
	(8) Continuous Improvement	1	1	3	1	1	1	5	5	18
	(9) Lean Metrics (QCD) Controls	0	2	4	0	4	5	3	3	18
	(10) Capacity Planning & OEE	2	2	0	1	0	4	2	1	11
	(11) Standard Work Labour Balancing	4	0	0	3	5	4	0	0	16
	(12) Standard Op. Procedures	3	0	5	0	5	5	1	1	20
	(13) Mistake Proofing	2	0	5	1	3	0	2	2	13
	(14) Quick Change Over (SMED/QCO)	3	4	0	5	3	3	3	3	24
	(15) Quality Tools RCA, 5 Whys, EWS	1	0	5	0	3	5	5	5	24
	(16) Statistical Process Control	0	0	5	0	4	3	2	3	17
	(17) Time Studies	0	0	0	2	3	5	3	0	13
	(18) TPM	0	0	3	3	4	4	4	3	21
	(19) Six Sigma	2	1	4	2	2	3	5	4	23

Value Stream Mapping (VSM) – Process Orientation and Transparent Processes

- ✓ Project Only - 2 days
- ✓ Training of up to 3 champions and Value Stream Mapping 1 process - 4 days

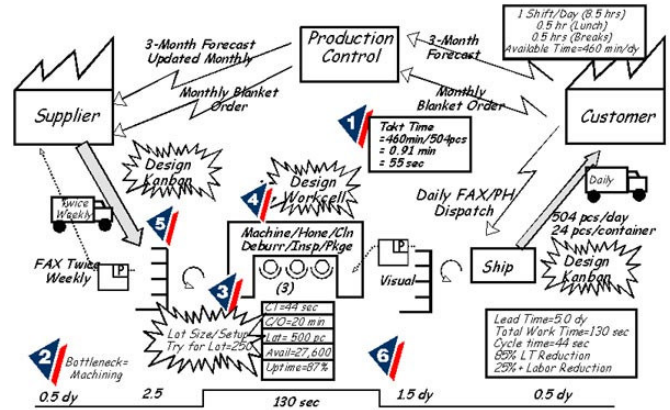
What is VSM and how will it help my workplace?

Vative Value Stream Mapping assesses your current or planned business' process steps and determines which processes add value to your product or service. Value Stream Mapping includes your incoming (suppliers) and outgoing (customers) steps. Once a current state map is established, project teams then plan a future state vision which drives action plans and goals.

Determines sources of waste (7 Wastes WODMITS):

- ✓ Waiting
- ✓ Overproducing / Over processing
- ✓ Defects
- ✓ Motion
- ✓ Inventory
- ✓ Transport
- ✓ Space

- ✓ Also considers environmental wastes and wasted resources



**Understanding your process,
 Is the key to improving it!**

Vative Value Stream Mapping:

- ✓ Identifies areas for improvement which could help increase business efficiency
- ✓ Shows links between the information and material flow
- ✓ Identifies areas requiring stock holding (buffers/supermarkets), determines trigger points and Change Over targets
- ✓ Determines process pace makers and Takt times



Lean Business Health Check (LBHC) – Continuous Improvement & Standardisation

- Project Only – approximately 2 days per product group

What is a Lean Business Health Check and how will it help my workplace?

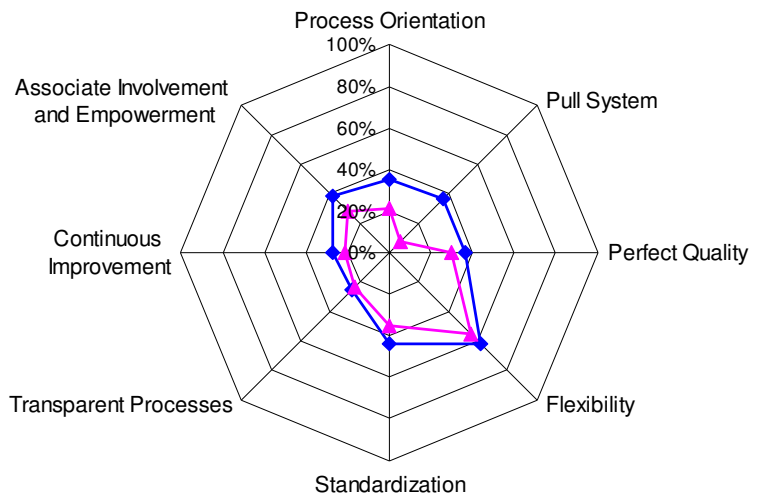
The Vative Lean Business Health Check is a diagnostic tool to evaluate multiple business units and their performance in relation to the 7 Lean pillars (Process Orientation, Pull Systems, Perfect Quality, Flexibility, Standardisation, Transparent Processes, Continuous Improvement & Associate Involvement and Empowerment). The assessment uses known benchmark standards achieved by leading companies practicing Lean. This is a comprehensive assessment which should be used to determine company vision and goals. It also measures improvement and Lean progress over time.

The Lean Business Health Check can be conducted on any one or all of the following business departments or sections - Production, Procurement, Processing Orders Office, Processing Customer Orders, Internal Logistics, Incoming and Finished Goods Stores, Associate Involvement and an overall Level of Implementation.

Application methods:

- Generally conducted every 6-12 months in line with the Lean business vision planning
Measures against benchmark standards of world class businesses practising Lean
Allows for assessment of each department individually and also the company overall
Ideal to plan business improvement and growth
Ideal to measure success of action plans and projects implemented

Overall Audit Results



Strive for excellence, And pave the road to reach it!

Measure the following company KPIs:

- (WIP) Inventory Total (Average over 6 months) - ratio of total stock value divided by demand/day
(Quality) Total rejects External returns PPM rate current
(Productivity) Total Labour required to make 100 pieces (min/100 pieces)
(Structural Cost) Overheads as either a cost or percentage in addition to labour rate
(Dock to Dock Time) Lead time for materials to move from supplier to the customer. Results from Value Stream Map in days

Professional Coaching – Self Development and Communication

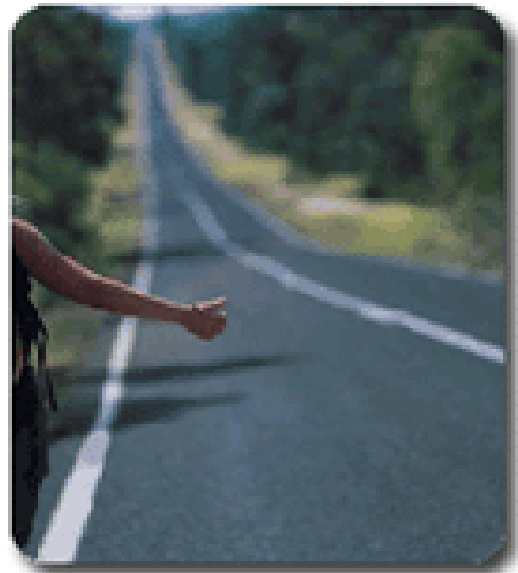
- ✓ Online questionnaire (25 to 60mins)
- ✓ Initial interview with your personal coach (1-2 hours)
- ✓ On-going development and guidance (as required)

What is involved in Personal Coaching and how will it help my business?

This is an effective tool in modelling leaders and decision makers. This is an excellent tool to develop individuals or entire teams of management. Personal coaching enables you to be the person you want to be. All of the different facets of your personality and character are made transparent via assessments. The areas of improvement are clearly identified and confidentially discussed. These results help identify blind spots or barriers in your performance and management technique and help to maximise your overall performance, satisfaction and happiness as an individual. This will help improve both your personal and work lives.

Answering 'Yes' to any of the following statements indicates the potential for improvement:

- ✓ I feel that I have low self-esteem or self-confidence
- ✓ I struggle to be decisive or assertive
- ✓ My long term goals and plans are not clear
- ✓ I frequently struggle to get all the things I want done and instead procrastinate
- ✓ I put a lot of pressure on myself to perform in life
- ✓ I feel overwhelmed by the stress in my life
- ✓ I want to achieve a better life and work balance
- ✓ I want to take the business to a new level



**You know where you want to go,
 you just need a little hand to get there!**

The benefits

- ✓ Know what you want and know how to get it (improved vision and awareness)
- ✓ Understand and build on your weaknesses
- ✓ Gain more motivation and inspiration
- ✓ Identify business needs, gaps and develop action plans to close gaps
- ✓ Increased motivation, satisfaction and happiness

5S Workplace Organisation – Impacting on all pillars

- ✔ 5 x 2 hour sessions plus project work

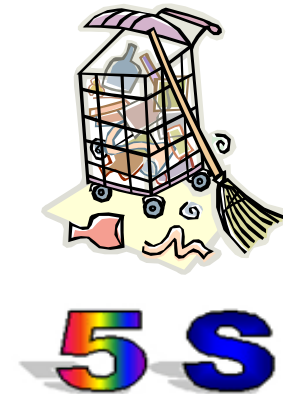
What is 5S and how will it help my workplace?

5S is the key foundation pillar for any organisational change. It provides a cleaner more organised and more efficient workplace. It begins the process towards a visually managed work area and leaves the team involved with a huge sense of achievement and enthusiasm.

Vative 5S implementation provides professional services for the introduction of 5S into a work area. 5S can be applied to any work area, including offices, to instil a culture which encourages improvements. Vative will work through the following 5S steps and provide direction to achieve a sustained system.

What are the 5S steps:

- ✔ S1 Sort (Seiri) - focuses on eliminating unnecessary work items
- ✔ S2 Set In Order (Seiton)- focuses on efficient and effective storage systems and workplace layout
- ✔ S3 Shine (Seiso) - this step establishes cleaning requirements and formulates a cleaning system which will help identify issues
- ✔ S4 Standardise (Seiketsu) - determines best practice work habits and educates others in the most efficient methods
- ✔ S5 Sustain (Shitsuke) - develops a strategy to sustain your activities and implements routine actions that will maintain an optimum environment



**A place for everything,
 And everything in its place!**

Vative 5S:

- ✔ Establishes an understanding of all Lean pillars as 5S delivers the greatest impact on Lean pillars
- ✔ Sets the standards for business and develops a Lean culture
- ✔ Creates efficiency in the workplace and minds of it’s workers
- ✔ Creates a safer and more aesthetically pleasing work area for a company and it’s employees
- ✔ All materials for training and implementation can be sourced through Vative

Kanban & Just In Time (JIT) – Pull Systems & Transparent Processes

- ✓ 3 x 2 hour sessions + 3 x 6 hour project implementation assistance for one pilot area

What are Kanban and JIT systems and how will they help my workplace?

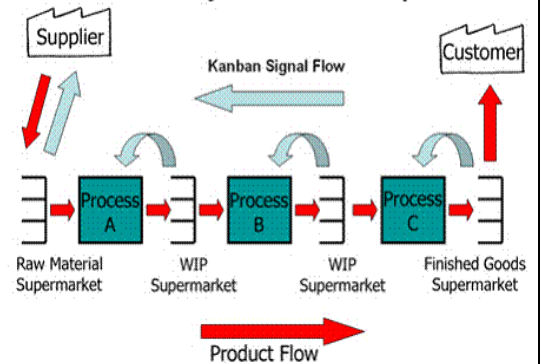
Vative Kanban & JIT Pull System techniques allows your processes to more accurately make only what the customer wants, when the customer wants it and only in the quantity the customer requires.

Kanban and JIT systems effectively control stock levels to optimum requirements for efficient production.

Kanban & Pull Systems:

- ✓ Provide controlled orders triggered from defined locations
- ✓ Reduce Work In Progress (WIP) and inventory costs
- ✓ Improve stock control
- ✓ Reduce lead time to delivery
- ✓ Allow visualisation of process demand
- ✓ Improve process deviation escalations and root cause rectification

Pull System Example



**Make only what the customer wants,
 When the customer wants it!**

Vative Kanban & JIT:

- ✓ Can eliminate the need for stock takes
- ✓ Develops a sustained approach the accurate stock control
- ✓ Can totally eliminate instances of missed deliveries and process disturbances due to stock shortages
- ✓ To lower WIP businesses must reduce batch sizes, and to reduce batch sizes must improve Change Over Times

Layout Planning – Process Orientation and Flexibility

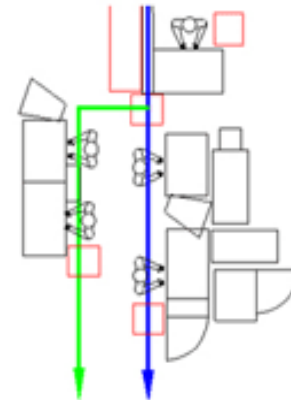
- ✓ Project dependent – Initially 3 x 8 hours

What is Layout Planning and how will it help my workplace?

Vative Layout Planning techniques allow you to make the most of your valuable space and streamline your processes. Our team has extensive experience in layout planning for processes and offices. Vative optimise a process by best positioning equipment and resources to deliver customer requirements in the shortest lead time at the highest quality.

Layout planning provides:

- ✓ A defined location for Equipment, Inventories and Service access
- ✓ Optimised flow patterns for high volume processes
- ✓ Graphical representation of your workplace for easier planning and strategic changes
- ✓ Clarity for potential problems in the design phase
- ✓ Improved workplace aesthetics and assists in 5S
- ✓ Ensures an Occupation Health and Safe work area as per Australian Standards



**Visualise your plans,
 So teams can make them reality!**

Vative Layout Planning:

- ✓ Can minimise floor space usage
- ✓ Can also be used to improve ergonomics
- ✓ Is generated in CAD file which can be used for presentations and data exchange

Kaizen & Continuous Improvement Processes – Improvement & Associate Involvement

- ✔ 3 x 2 hour sessions + 3 x 6 hour project implementation assistance for one pilot area

What is Kaizen and CIP and how will it help my workplace?

Kaizen and CIP are systems and techniques that teach your teams how to effectively analyse wastes within their work areas. By evaluating their dollar value and then implementing actions via DMAIC (Define, Measure, Analyse, Improve, Control) and Root Cause Analysis techniques (Fishbone and 5 Whys), your team will eliminate the waste at it's source.

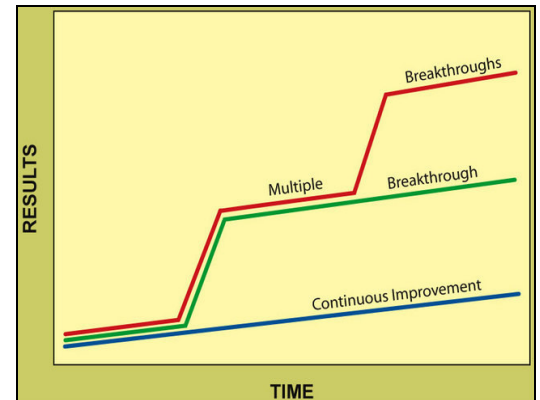
The Kaizen/CIP system instils a culture of routine and encourages the entire team to work jointly on resolving waste issue within the workplace.

Continuous Improvement:

- ✔ Provides a defined process for approaching and resolving issues
- ✔ Develops a routine and culture for continuous improvement

The process steps:

- ✔ The team clearly defines the issue
- ✔ The issue is analysed via a team board for potential causes, without jumping to conclusions, using fishbone diagram
- ✔ Likely causes are tested for validity using 5 Whys
- ✔ Likely cause undertake action using a DMAIC technique



**Continuous Improvement
Is a competitive advantage!**

Vative Continuous Improvement:

- ✔ Uses Toyota Ishikawa (Fishbone) diagrams
- ✔ Uses Ford 5 Whys techniques
- ✔ Uses Motorola Six Sigma DMAIC improvement management techniques
- ✔ Drives toward perfect quality

Lean Metrics – Transparent Processes & Standardisation

- ✔ 3 x 2 hour sessions + 3 x 6 hour project implementation assistance for one pilot area

What is Lean Metrics and how will it help my workplace?

Lean Metrics are a standard set of measures that monitor the performance of processes through visual management techniques. The workshop targets are developed specifically for each company. Although measuring different specific measures, they always focus on Lean objectives QCD (Quality, Cost (productivity), Delivery (people and process performance)).

This standard set of measures helps your teams to strive for targets and goals, boosts output and product quality and allows the management team to easily manage processes at a glance. Once developed, metrics can be implemented company wide using a standardised approach.

Lean Metrics:

- ✔ Provide standard KPIs company wide
- ✔ Provide the ability to measure performance between business units and companies

The process steps:

- ✔ Existing measures are analysed
- ✔ Required measures are discussed
- ✔ Standards are developed to company needs
- ✔ Metrics are rolled out to all team members through training and practical examples



**If you can't measure it,
You can't improve it!**

Vative Lean Metrics:

- ✔ Measure Quality performance of processes
- ✔ Measure Cost/Productivity performance of processes
- ✔ Measure Delivery/DIFOT performance of processes
- ✔ Measure Downtime/OEE performance of processes
- ✔ Measure Absenteeism/Morale
- ✔ Measure OH&S and Safety

Overall Equipment Effectiveness (OEE) and Capacity Planning – Transparent Processes

- ✓ 3 x 2 hour sessions + 3 x 6 hour project implementation assistance for one pilot area
 (Timing based on process data being available; otherwise standard times may be required)

What is OEE and Capacity Planning and how will it help my workplace?

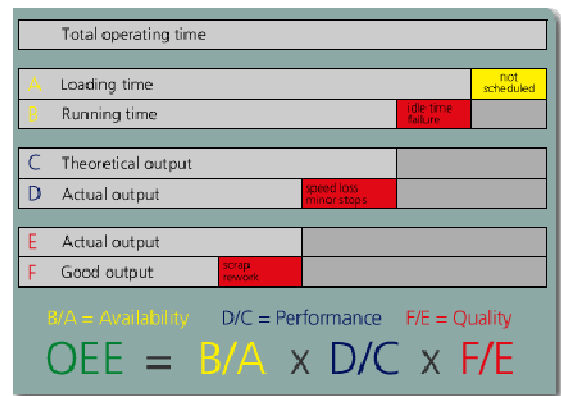
Do you know your equipment output and what the actual utilisations of your costly investments are? OEE or Overall Equipment Effectiveness measures how effective your equipment or capital resources are utilised within your processes. A capacity planner effectively evaluates your processes and planned volumes to determine how loaded each process is within your value stream. Knowing this information allows you to then plan for more business growth and where to focus process improvements to gain the biggest advantages towards business profits. It will also give you the ability to plan for future scenarios and provide forewarning before processes run out of capacity.

OEE Provides:

- ✓ Clear understanding of your expected process output
- ✓ Transparency in process performance
- ✓ Clarity in contributing factors towards process losses or wastes related to breakdowns, stoppages and others

Capacity Planning Steps:

- ✓ Existing measures are analysed
- ✓ Required measures are discussed
- ✓ Standards are developed to company needs
- ✓ Metrics are rolled out to all team members through training and practical examples



**Invest in optimisation,
Not capital!**

Vative OEE and Capacity Planning:

- ✓ Established standard times are required to accurately construct these tools
- ✓ Only basic MS Excel is needed
- ✓ Shop floor teams can monitor OEE on basic paper charts
- ✓ To achieve a good OEE performance processes must have an optimised Change Over Process

Standard Work & Labour Balancing – Transparent Processes & Standardisation

- ✓ 3 x 2 hour sessions + 3 x 6 hour project implementation assistance for one pilot area (Development of documentation project dependent)

What is Standard Work & Labour Balancing and how will it help my workplace?

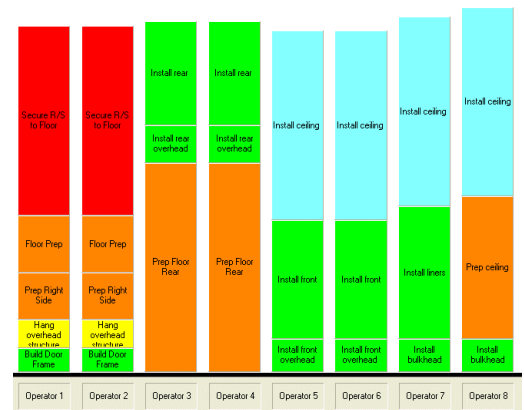
Standard Work tools develop and document the most efficient methods for your team to conduct work on the most common activities. This will ensure that your processes are completed in the most effective means with regards to quality and efficiency. This also allows for new team members to be easily trained using the best practices and in the shortest time. It provides a standard approach towards the activities and tasks. Once the data for each process is gathered, it then allows for multiple processes within the value stream to be balanced. This will help your process achieve greater output with the same labour allocations. This project ties in closely with OEE and Capacity Planning.

Standard Work provides:

- ✓ Clear understanding of the optimum way to complete tasks
- ✓ Transparency in process requirements
- ✓ Accurate time studies for each of the specific tasks for each variant

Labour Balancing provides:

- ✓ Encouragement of single piece flow in the process
- ✓ Best utilisation of available labour
- ✓ Setting of process rhythm
- ✓ Elimination of bottlenecks and creation pace makers



Is your process a pipeline, Or an hour glass?

Vative Standard Work and Labour Balancing:

- ✓ Only useful for repetitive processes
- ✓ Only basic MS Excel is needed
- ✓ Is linked to Metrics and performance measures
- ✓ Drives towards a flexible work force
- ✓ Is the base data required to develop Standard Operating Procedures or SOPs



Standard Operating Procedures (SOPs) – Transparent Processes & Standardisation

✔ Project dependant only

What are SOPs and how will they help my workplace?

Every business needs **standard operating procedures** to ensure that the organisation adopts a best practice approach to executing tasks in the workplace. SOPs are living documents that contain instructions describing the steps to follow for all activities under defined conditions.

SOPs can be created in hard copies and also online. Online format allows staff to **find exactly what they want, when they want it.**
Save their time and yours – all the information you need them to know in one easily accessible place.

What are the steps:

- ✔ Analyse your existing procedural documentation
- ✔ Organise your procedures into a standardised and user-friendly format
- ✔ Update existing procedures and write new procedures to make your SOPs current and complete
- ✔ Make the SOPs accessible to all staff in a format that suits them, for example:
 - online and searchable
 - printed manuals
 - pocket guides

Policies
Writing Procedures
Manuals
Intranet
Website
Training materials

**Protect your investment in people and systems.
Record and publish SOPs!**

Protect your investment in people and systems by:

- ✔ Having all your SOPs documented, up-to-date and complete
- ✔ Maintaining your SOPs and changing them to reflect new procedures, systems, circumstances and regulatory requirements
- ✔ Ensuring your staff have the knowledge to perform their tasks using best practice
- ✔ Requires Standard Work & Labour Balancing as a prerequisite

Mistake Proofing (Poka Yoke) – Perfect Quality & Standardisation

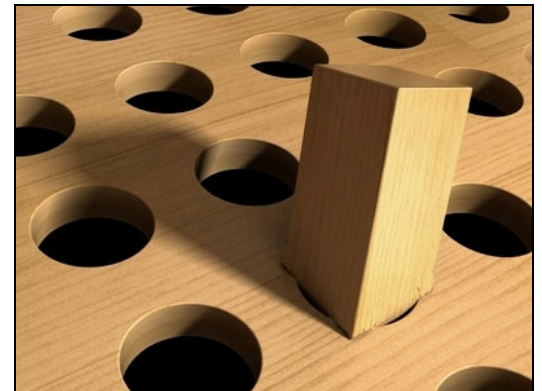
- ✔ 3 x 2 hour sessions + 3 x 6 hour project implementation assistance for one pilot area

What is Mistake Proofing and how will it help my workplace?

Poka Yoke is the Japanese name for Mistake Proofing. Mistake proofing ensures that any chance of error is eliminated by way of process or product design. Mistake proofed processes eliminate costly investments in detecting potential quality problems by eliminating the chance of error entirely, instead of implementing costly checks and tests after the error may have occurred.

This technique teaches your teams how to:

- ✔ Identify potential risks within your process
- ✔ Implement system that will mistake proof your process from costly quality errors
- ✔ Develop a clear understanding of the optimum way to complete tasks
- ✔ Make processes more transparent
- ✔ Reduce processing effort
- ✔ Improved quality
- ✔ Eliminate quality Risk



**Designing out risks,
 Not fixing the faults!**

Vative Mistake Proofing:

- ✔ Only useful for repetitive processes
- ✔ Best results achieved when linked into product design
- ✔ Drives towards a zero defect process

Quick Change Over (QCO or SMED) – Impacting on all pillars

(SMED – Single Minute Exchange of Die)

- ✔ 5 x 2 hour sessions + 5 x 6 hour project implementation assistance for one pilot area

What is Quick Change Over and how will it help my workplace?

Quick Change Over Programs systematically reduce the down time experienced when your process changes between one variant to another.

Using Lean techniques we teach your team about:

- ✔ Why change over time improvements are important
- ✔ Details of Change Over with regards to Internal/External time, preparation and after tasks
- ✔ Sequencing the change over efficiently
- ✔ Identifying wastes in the current process
- ✔ Effectively implementing system to eliminate those wastes
- ✔ Monitoring the performance of the change over
- ✔ Continuing the process for other types of Change Overs



**The ultimate goal,
Is to be as effective as a pit crew!**

Vative Quick Change Over (QCO or SMED):

- ✔ Improves Overall Equipment Effectiveness by reducing downtime
- ✔ Drives towards pull systems via batch size reduction
- ✔ Creates process flexibility

Quality Tools – Perfect Quality

- ✓ Root Cause Analysis 3 x 2 hour sessions technique training + 3 x 6 hour setup areas
- ✓ 8D systems, Quality Firewalls and Early Warning Systems are project dependent

What are Quality Tools and how will it help my workplace?

Root Cause Analysis can help to pinpoint root causes of recurring process issues that cost you money. Vative use systematic methods (**8D & 5 Whys**) to establish root causes of complex process issues.

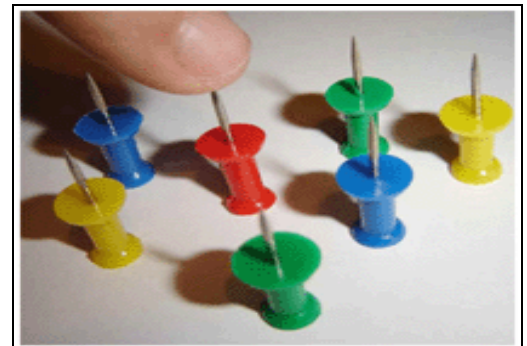
Firewall Quality Control Systems strive towards achieving zero ppm quality for customers. Firewalls provide a detailed analysis of all your process Quality Gates (inspection areas) cross referenced with potential faults via **PFMEAs** and actual faults found in process. By identifying potential risks and driving improvements via **Poke Yoka** and upstream **Early Warning Systems**, quality problems can be totally eliminated.

Early Warning Systems measure process quality deviations at the source. By detecting a deviation at the source it allows for quicker and easier Root Cause Analysis and resolution. Quality faults found at the customer are too late and are normally much harder to determine root cause.

Zero Monodukuri (Zero Defect) are Japanese versions similar systems to those listed above.

Using Lean techniques we teach your team about:

- ✓ Why quality is important
- ✓ How to define a problem effectively
- ✓ How to use Ishikawa (fishbone) and 5 Why root cause analysis techniques to effectively resolve issues as a team
- ✓ How to determine the current quality risks
- ✓ What a PFMEA is and how to use it to drive improvements
- ✓ What Early Warning Systems are and how to use this tool to remove quality risks
- ✓ How to implement effective in process quality monitoring



**Quality is never an accident,
 It's the result of careful execution!**

Vative Quality Tools:

- ✓ Links directly to Continuous Improvement Processes
- ✓ Links directly to Overall Equipment Effectiveness

Can also be used to:

- ✓ Reduce stock fluctuations
- ✓ Lower reject losses
- ✓ Determine Root Cause of process control issues
- ✓ Improve equipment uptime

Statistical Process Characterisation & Control (SPC) – Perfect Quality

- ✔ Implementation and training is project dependent

What is Statistical Process Characterisation and control and how will it help my workplace?

The purpose of this program is to introduce participants to phases of process characterisation using common statistical techniques and problem-solving methodologies.

- ✔ Develop a histogram and check for normality
- ✔ Calculate standard deviation, mean Cp and Cpk to quantify the ability of the process to respond to the customer’s specifications
- ✔ Develop Pareto diagrams, cause-and-effect diagrams, and conduct Multi-variant analysis to optimise a process
- ✔ Develop variable and attribute control charts to monitor a process

SPC is a method of monitoring a process during its operation in order to control the quality of the products while they are being produced, rather than relying on inspection to find problems after the fact. It involves gathering information about the product, or the process itself, on a near real-time basis so that the operator can take action on the process. This is done in order to identify special causes of variation and other non-normal processing conditions, thus bringing the process under statistical control and reducing variation.

Identify the 4 Phases of process characterisation:

- ✔ Phase I - Definition
- ✔ Phase II - Analysis
- ✔ Phase III – Optimisation
- ✔ Phase IV - Control

Develop Histograms and check for normality:

- ✔ A graphic representation of the distribution of data.
- ✔ A quick view of the amount of variation in a process

Understand and calculate standard deviation:

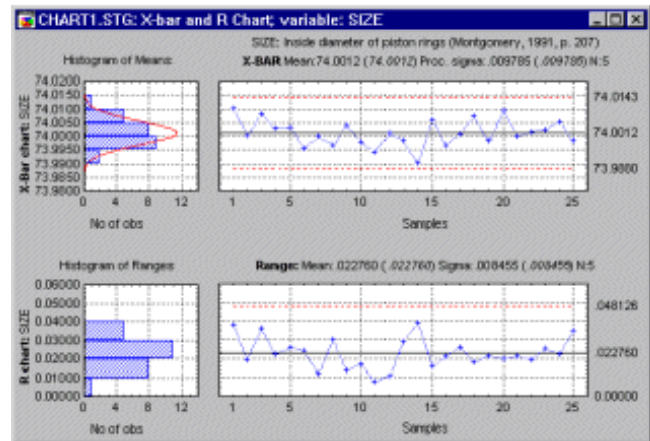
- ✔ Cp & Cpk
- ✔ Learn mean, sigma and capability indices

Pareto diagrams, C-E diagrams, Multi-variant Analysis:

- ✔ 80-20 rule, fishbone charts (C-E), Observation and recording

Control charts

- ✔ Understanding attribute data and variation, establishing and interpreting control charts



**SPC,
is the key to process stability.**

Key points/outcomes :

- ✔ Data collection, Histograms, Multi-variant Analysis, Pareto Diagrams, Process capability study, Scatter diagrams, Control charts

Time Studies – Standard Work

- ✔ Implementation and training is project dependent

What are Time Studies and how will it help my workplace?

Vative Process Time Studies will provide your business with an overview of Value Adding processes and how they are balanced between process steps. These methods are used to improve processes including Quick Change Over (SMED) and Standard Work.

Using Lean techniques we teach your team about:

- ✔ Why change over time improvements are important
- ✔ Details of Change Over with regards to Internal/External time, preparation and after tasks
- ✔ Sequence the change over efficiently
- ✔ Identify wastes in the current process
- ✔ Effectively implement system to eliminate those wastes
- ✔ Monitor the performance of the change over
- ✔ Continue the process for other types of change overs
- ✔ See Quick Change Over, Standard Work and Labour Balancing information



**Time can be saved,
By measuring the requirements!**

Our Resultants are efficient and nationally qualified in:

- ✔ Stop watch studies
- ✔ UAS (Universal Analysis System)
- ✔ MTM (Methods Time Measurement)
- ✔ Operator speed performance assessment

Total Productive Maintenance – Impacts on all pillars

- ✓ Understanding TPM and it's 8 Pillars - 2 hours (Target : Plant Management)
 - ✓ Autonomous Maintenance (AM) Overview - 2 hours (Target : Production Management)
 - ✓ Preventive Maintenance (PM) Overview – 2 hours (Target : Maintenance Management)
 - ✓ Step 1 (including Getting Ready) – 3 full days (Target : Maintenance staff)
 - ✓ Step 2 & 3 – 3 full days (Target : Maintenance staff)
- Note : Prerequisite courses – 5S, Kanban systems

What is TPM and how will it help my workplace?

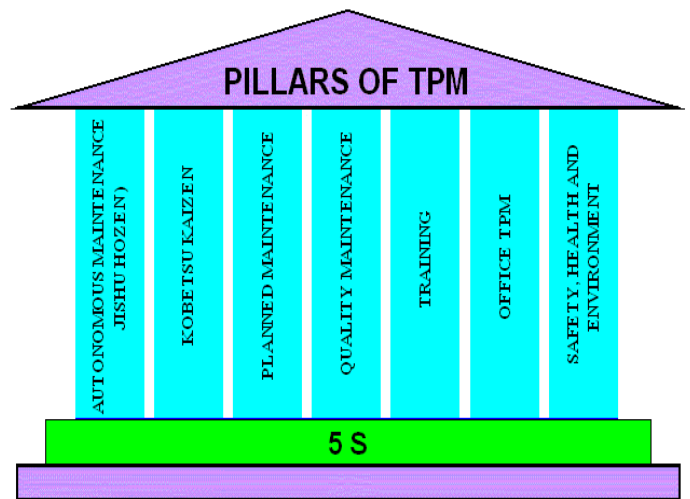
It can be considered as the medical science of machines. Total Productive Maintenance (TPM) is a maintenance program which involves a newly defined concept for maintaining plants and equipment. The goal of the TPM program is to markedly increase production while, at the same time, increasing employee morale and job satisfaction. TPM brings maintenance into focus as a necessary and vitally important part of the business. It is no longer regarded as a non-profit activity. Down time for maintenance is scheduled as a part of the manufacturing day and, in some cases, as an integral part of the manufacturing process. The goal is to hold emergency and unscheduled maintenance to a minimum.

Step 1 (includes Getting Ready)

- ✓ Learn the Tools and Techniques in Planned Maintenance
- ✓ Understand the 7 steps of Planned Maintenance (ref. Japan Institute of Planned Maintenance)
- ✓ Apply Step 1 of Planned Maintenance at your workplace

Step 2 and 3 (includes Workshop)

- ✓ Countermeasures (based on Equipment Failure Map)
- ✓ Why-Why Analysis
- ✓ Zero component/equipment failure due to forced deterioration
- ✓ Identify and determine Cleaning, Inspection and Lubrication(CIL) checkpoints
- ✓ Incorporate functional machine cleaning into Autonomous Maintenance (AM) operating procedures
- ✓ Understand and implement Visual Control Systems (VCS)



**Machines and people make money,
 Only together can they improve!**

Key points/outcomes :

- ✓ Step 1 : Line of sight PM Board, Team formation, Master Plan generation, MTBF, MTBA, MTTR, OEE, A-tagging, Planned Maintenance Schedule, Maintenance Standard, Minor restoration, One Point Lesson(OPL), Kanban systems, Workplace organization (WPO)
- ✓ Step 2 : 5 failure factors, Why-Why Analysis Tool knowledge, Documentation, Team Assessment, Understanding equipment and its components intimately.

Six Sigma (Motorola Certified) – Continuous Improvement

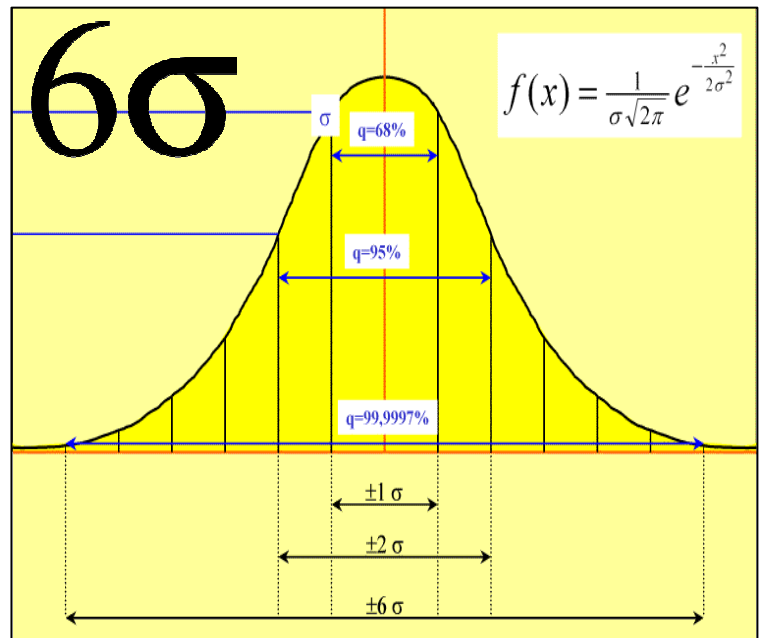
- ✓ Leadership Jumpstart – 2 full days (Target : Senior management)
- ✓ Champion Training (Six Sigma Foundation) – 2 days (Target audience : Managers)
- ✓ Yellow Belt – 2 days (Target : Team members and YB candidates)
- ✓ Green Belt Training – 6 days (Target : Team members and GB candidates)
- ✓ Black Belt Training – 20 days (Target : Project team leaders and BB candidates)

What is a Six Sigma and how will it help my workplace?

Sigma is a statistical term that measures deviation from the process mean or target. The figure of six was determined statistically by looking at the current average performance levels of most business enterprises. Six sigma programs are applicable to any business process in any industry. It has proven to be successful for telcos, utility companies, financial services, energy, transportation and manufacturing enterprises. Six sigma programs utilized efficiently will reduce defects, produce superior quality and ultimately ensure long term profitability of any enterprise. Typical ROI (return of investment) scenarios are between 1:10 and 1: 50.

Overview :

- ✓ **Leadership Jumpstart** - To align the Six Sigma Business Improvement Campaign with your overall business strategies and goals. The result of the Jumpstart is a set of high impact projects for implementation and your Six Sigma Campaign Plan
- ✓ **Champion Training** - Six Sigma champions receive intensive training that prepares them for managing resources in a Six Sigma environment and conducting ongoing project reviews
- ✓ **Yellow Belt** – An introductory session to statistics and a covers a subset of the Green Belt program
- ✓ **Green Belt** - Green Belt training cascades Six Sigma approaches and techniques throughout your organization. Green Belts receive training that covers a subset of the comprehensive Black Belt program
- ✓ **Black Belt** - Black Belts are experts in applying statistical process control techniques to improvement opportunities. The program is four weeks over a four month time frame and is constructed upon the DMAIC methodology. As participants complete each segment of training, they will immediately apply the concepts and tools learned to the projects you’ve identified



**You can never change something,
 By fighting the existing reality!**

Key notes:

- ✓ Six Sigma was invented by Motorola
- ✓ Programs are fully endorsed (and in most cases) delivered by Motorola trained personnel
- ✓ Vative is a business partner of Motorola



Additional Services Available through Vative

Manufacturing Qualifications:

Certificate III in Process Manufacturing (Floor Operators)

Certificate III in Competitive Manufacturing (Floor Operators)

Certificate IV in Competitive Manufacturing (Team Leader / Supervisor)

Diploma of Competitive Manufacturing (Middle / Senior Management)

Logistics Qualifications:

Certificate III in Warehouse & Storage (Floor Staff)

Certificate IV in Warehouse & Storage (Team Leader / Supervisor)

Certificate III in Road & Transport (Driver & Driver Assistant)

Office Qualifications:

Certificate III in Administration (Office Operator)

Certificate IV in Administration (Office Supervisor / Manager)

Certificate IV in Front Line Management (Front Line Managers)

Certificate III in Wholesale Operations (Sales / Customer Service)

Certificate IV in Business Development (Sales)

Short Courses & Accreditations

In order to achieve a higher grade training outcome, we also offer, through allied service providers, a large range of industry specific short courses to meet the individual needs of the client. Some of those courses are:

Forklift licenses	Occupational Health & Safety
First Aid	Fire & Emergency
Manual Handling	Duty of Care
Workplace Behavior	Fatigue Management
Risk Management	Introduction to LEAN
LEAN Leaders	Workplace Communications