



Site Assessment Report

ORGANIZATION REGISTRATION DETAILS

| | |
|---------------------|--------------|
| ZED ID | |
| Organization Name | |
| Organization Type | Micro |
| Registration Number | |
| Incorporation Date | -- |
| Industry Sector | -- |
| MSME Type | Micro |
| No. of Employees | 6 |
| Turnover | 0 |
| Products | -- |
| Female Promoter | -- |
| Promoter Category | -- |

CONTACT DETAILS: REGISTERED ADDRESS

| | |
|---------------------|--------------|
| ZED ID | ZE |
| Organization Name | |
| Organization Type | Micro |
| Registration Number | |
| Incorporation Date | -- |
| Industry Sector | -- |
| MSME Type | Micro |
| No. of Employees | 6 |
| Turnover | 0 |
| Products | -- |
| Female Promoter | -- |
| Promoter Category | -- |

CONTACT DETAILS: FACTORY/ OFFICE ADDRESS OF ASSESSED UNIT

| | |
|---------------------|--------------|
| ZED ID | |
| Organization Name | |
| Organization Type | Micro |
| Registration Number | |
| Incorporation Date | -- |
| Industry Sector | -- |
| MSME Type | Micro |
| No. of Employees | 6 |
| Turnover | 0 |
| Products | -- |
| Female Promoter | -- |
| Promoter Category | -- |

OWNER/CEO DETAILS

| | |
|---------------------|--------------|
| ZED ID | Z |
| Organization Name | g |
| Organization Type | Micro |
| Registration Number | K |
| Incorporation Date | -- |
| Industry Sector | -- |
| MSME Type | Micro |
| No. of Employees | 6 |
| Turnover | 0 |
| Products | -- |
| Female Promoter | -- |
| Promoter Category | -- |

Venue

A PHP Error was encountered

Severity: Notice

Message: Undefined offset: 175

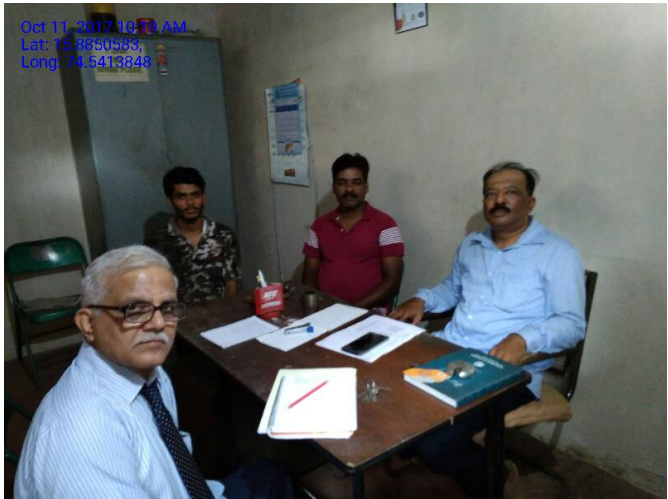


Site Exterior Photo



Site Interior Photo

Opening Meeting



Opening Meeting Photo

A PHP Error was encountered

Severity: Notice
Message: Undefined offset: 175
Filename: views/index.php
Line Number: 579
Backtrace:
File: /var/www/zec-

rc/public_html/application/portal/modules/sareport/views/index.php
Line: 579
Function: _error_handler

File: /var/www/zec-rc/public_html/application/portal/third_party/MX/Loader.php
Line: 357
Function: include

File: /var/www/zec-rc/public_html/application/portal/third_party/MX/Loader.php
Line: 300
Function: _ci_load

File: /var/www/zec-rc/public_html/application/portal/views/templates/superadmin/template.php
Line: 50
Function: view

File: /var/www/zec-rc/public_html/application/portal/third_party/MX/Loader.php
Line: 357
Function: include

File: /var/www/zec-rc/public_html/application/portal/third_party/MX/Loader.php
Line: 300
Function: _ci_load

File: /var/www/zec-rc/public_html/application/portal/core/MY_Controller.php
Line: 82
Function: view

File: /var/www/zec-rc/public_html/application/portal/modules/sareport/controllers/Sareport.php
Line: 293
Function: _render_page

File: /var/www/zec-rc/public_html/index.php
Line: 317
Function: require_once

Participants (5)

PRASHANT BHASKAR MARATHE -Lead
Assessor

Sharad Shankar Javalkar -Assessor

Mr. Vijaya Kumar -Proprietor

Mr. Nagraj -CNC Programmer

Mr. Ramesh -Foundry Labour

Site Tour (23)



Induction Furnace is not in use.



Raw Material storage



Compressor - Capacity 10 bar



Sand waste



Earthing for transfirmer- 7 nos earthing-
maintenance free



Core making machine



Unsafe condition- possibility of electric shock



- By Unsafe condition- Woden cover on water tank
Unsafe cobdition- Wooden cover for water tank



- By Unsafe condition- extended metal bars
Unsafe condition



- By Unsafe condition- wires and switchboard lying on the ground
Crucile furnace- Unsafe confition



Clean area



Unclean area



Raw Material



Pattern cope & drag



Cooling tower for induction furnace water



- By Plant layout/ plant layout review document
Un Clean area



- By Crucible
Crucible for NonFerrous casting



- By Air compressor
Air Compressor for pneumatic pressure 10 bar



- By Core making machine
Core making machine for shell core



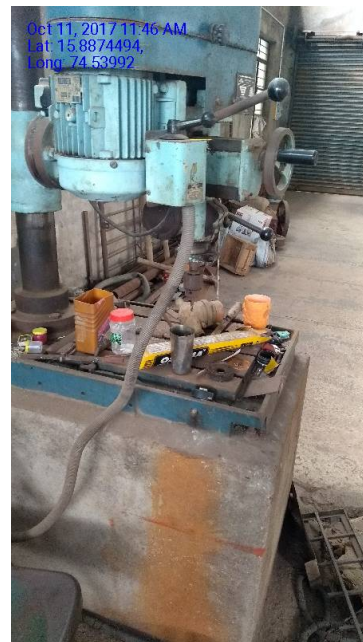
- By Sand mixing
Sand Mixing



- By Earthing pole near transformer
Earthing electrodes for transformer



- By Plant walk through and pictures/document
observations on automation (Compile in a single file)
Unsafe wires



- By Unclean area
Improper house keeping Tools not kept properly

All Parameters

A2 : Process Capability Assessment and Enhancement

Description

Realize the process potential, stabilizing and continuously improving process performance

Questions 4

OSA Score 3.05

DA Score 3.05

SA Score 2.00

1: What is the level of implementation of product quality or robustness reviews?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|----------------------------|
| Site Assessment CHANGED | Option 2: No concept of product robustness / product quality reviews | SPC need to be established |
| SA Evidences | No Evidences added by SA | SA Score: 0.50 |

2: What is the level of robustness of CAPA management system to stabilise and improve processes?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 2: Adhoc corrective actions implemented | ADhoc CA actions done. SPC need to be established. |
| SA Evidences | No Evidences added by SA | SA Score: 0.50 |

3: How do you measure effectiveness of product robustness / product review ?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 2: Process capability is not monitored | Since proprietor is technocrat .he ensures product review |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

4: How do you plan for maintaining product robustness/ product quality ?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|---|
| Site Assessment AGREED | Option 2: Planning based on feedback from customers (market complaints), QC | Customer feedback is considered. CNC programmed with drawing specifications. First piece inspection is used |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

A4 : Waste Management

Description

Work place design for reducing Muda, Mura, Muri (3M) in operations

Questions 5

OSA Score 3.80

DA Score 3.80

SA Score 3.05

1: What is the level of awareness regarding waste and it's effect on profitability?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 5: All employees are aware on waste and effect on profitability | Interviewed Proprietor & he is aware of awareness of waste & Property |
| SA Evidences | No Evidences added by SA | SA Score:1.00 |

2: What level of training has been provided to the employees on tools and techniques?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 2: No training provided on waste management techniques /tools | Proprieter need to be provided the training on 7wastes & 3M |
| SA Evidences | No Evidences added by SA | SA Score:0.50 |

3: What are the various tools used to manage waste?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: No tools used to manage waste, a reactive approach is followed | Tools of standard work & 7 wastes are not used |
| SA Evidences | No Evidences added by SA | SA Score:0.50 |

4: What is the level of targets being met for waste reduction?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: No action plan available for targets to reduce waste | Action plan to reduce the waste is not available |
| SA Evidences | No Evidences added by SA | SA Score:0.30 |

5: What is the level of sand disposal after sand molding?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|---|
| Site Assessment AGREED | Option 5: Option 4 + Sand used for molding is perfectly re-used after breaking the mold | Sand used for moulding is resused by using same sieving machine |
| SA Evidences | SA Evidences (2) | SA Score:0.75 |

A5 : Safe Working Environment

Description

Planning for implementation for safe working of all processes and personnel

Questions 6

OSA Score 2.08

DA Score 2.08

SA Score 1.88

1: What is the status of safety policy?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--------------------------------------|
| Site Assessment CHANGED | Option 2: No formal safety policy in place | Formal Saftey Policy does not exist. |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: How do you communicate the safety policy to the employees?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 2: No communication on safety policy | Evidence of communication not available, as there is no Saftey Policy. |
| SA Evidences | No Evidences added by SA | SA Score: 0.25 |

3: What is the level of training and implementation on safety for personnel and processes?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--------------------------------------|
| Site Assessment CHANGED | Option 3: Training imparted but no regular schedule | Being done but not on regular basis. |
| SA Evidences | No Evidences added by SA | SA Score: 0.38 |

4: What mechanism is in place to ensure safety?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|-----------------------------------|
| Site Assessment AGREED | Option 2: Major safety incidents are investigated and CAPAs taken | Major accidents are invistigated. |
| SA Evidences | No Evidences added by SA | SA Score: 0.25 |

5: What is the coverage of safety techniques?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|----------------|
| Site Assessment AGREED | Option 1: No specific system for investigation of accidents/incidents | No system |
| SA Evidences | SA Evidences (3) | SA Score: 0.00 |

6: What is the process to review safety techniques?

| ANSWER BY | ANSWER | COMMENT |
|-----------|--------|---------|
| | | |

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--------------------------|
| Site Assessment AGREED | Option 2: Reviews for safety techniques done on adhoc basis | Not done systematically. |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

C1: Swachh Workplace

Description

Create a clean, tidy, organized and cheerful workplace for improving productivity by involving all

| | | | | | | | |
|-----------|---|-----------|------|----------|------|----------|------|
| Questions | 3 | OSA Score | 3.30 | DA Score | 3.30 | SA Score | 2.00 |
|-----------|---|-----------|------|----------|------|----------|------|

1: What is the level of training on 5S?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---------------------------------|
| Site Assessment CHANGED | Option 2: No communication and training imparted to anyone on 5S | 5s training need to be imparted |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: What is the level of implementation of 5S?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|----------------------------------|
| Site Assessment CHANGED | Option 2: Work area is full of clutter (scrap etc.) and floor space unclean | Is implementation is in progress |
| SA Evidences | SA Evidences (1) | SA Score: 1.00 |

3: What % of targets are met as per 5S audit assessment framework?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|-------------------------------------|
| Site Assessment CHANGED | Option 2: No framework exist for 5S audit assessment | 5S Framework need to be established |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

C2: Daily Works Management

Description

Create a continually improving workplace for enhancing quality, productivity and safety by involving all on daily basis

| | | | | | | | |
|-----------|---|-----------|------|----------|------|----------|------|
| Questions | 5 | OSA Score | 3.60 | DA Score | 3.60 | SA Score | 2.75 |
|-----------|---|-----------|------|----------|------|----------|------|

1: How do you set daily targets?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 3: Adhoc target setting on Quality, Cost and Delivery | Gear pin was order with po nopt6 dated 11th Sept 2017 was 100 nos however 88 nos. |

| ANSWER BY | ANSWER | COMMENT |
|--------------|------------------|---|
| | | Despatched with no invoice no310 dated 6th Oct 2017. Verified & invoice & LR copy upload Rd. System needed to be established. Can |
| SA Evidences | SA Evidences (2) | SA Score: 0.60 |

2: How are the targets communicated/managed?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|-------------------------------------|
| Site Assessment AGREED | Option 2: Formal visual management highlighting targets to be achieved in a day on a board | Targets are achieved more than 80 % |
| SA Evidences | No Evidences added by SA | SA Score: 0.50 |

3: What is the level of participation of workmen in the daily meetings?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: Workmen participate in daily meetings, however agenda and effectiveness not established (Formal / informal) | Agenda & effectiveness parameters need to be established |
| SA Evidences | No Evidences added by SA | SA Score: 0.75 |

4: How do you address the gap identified ?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 3: - Adhoc corrective actions implemented to address gaps in QCDSM targets | The corrective actions need to be established for root cause analysis |
| SA Evidences | No Evidences added by SA | SA Score: 0.45 |

5: What is the target achievement rate for QCD improvement?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|----------------|
| Site Assessment CHANGED | Option 3: <50% targets have been met for QCD improvements | 88 % achieved |
| SA Evidences | No Evidences added by SA | SA Score: 0.45 |

C4 : Process Control

Description

Application of statistical quality control method, to monitor and control processes, to identify variances as a basis for continual improvement

Questions 4

OSA Score 4.15

DA Score 4.15

SA Score 2.75

1: What is the approach towards process control ?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 2: Process control approach followed on adhoc basis | All process control through C N C programming |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: What is the mode of communication of control plan?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 2: No standards/SOPs available to define control plans | Cnc programming & Drgs along with first piece approval I done |
| SA Evidences | No Evidences added by SA | SA Score: 0.50 |

3: What is the adherence to quality framework/ process control plan?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 5: Process control plans in place with adherence >60%-90% | CNC Programming +minimum rejection i.e . see below 0.5% |
| SA Evidences | SA Evidences (1) | SA Score: 1.25 |

4: What is the status of CAPAs based on process controls?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 2: No concept of CAPA to address variances in processes | Relevant actions are taken . Rejection is below 0.5 %however evidences need to be to produced |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

E2 : Timely Delivery

Description

Adherence to delivery timelines

Questions 3 OSA Score 4.30 DA Score 4.30 SA Score 3.50

1: What techniques are used to ensure effectiveness of timely delivery?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 3: Adhoc measurement of effectiveness of timely delivery techniques | Lean principles not evident. But there are adhoc measurements of effectiveness. |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

2: What is the % adherence to process delivery contracts?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|-------------------------|
| Site Assessment AGREED | Option 4: Adherence to process delivery contracts is >75-99% | 88% adherence observed. |
| SA Evidences | SA Evidences (1) | SA Score: 2.00 |

3: What is the level of robustness of the CAPA in case of missing contracts?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--------------------------------------|---|
| Site Assessment CHANGED | Option 3: Delivery delays identified | Delivery delays are identified but systematic corrective actions not evident. |
| SA Evidences | SA Evidences (1) | SA Score: 0.90 |

F2 : Systems for Abatement of Effluent, Emissions and Wastes

Description

Design plant & equipment and processes as a an integral part of manufacturing or service delivery systems so as to eliminate, reduce, treat or dispose effluents / emissions and solid wastes

Questions 4

OSA Score 4.55

DA Score 4.55

SA Score 2.50

1: What is the approach towards ensuring reduced effluents, emissions and wastes?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: - Adhoc approach to ensure reduced effluents, emissions and wastes | No systematic approach for identification of legal requirements and ensuring reduction of effluents, emissions and wastes. |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: What is the infrastructure in place to ensure best environment performance?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: - Plant equipments are in place to address major effluents / emissions. Dust extractors used for processes like Grinding and buffing. | Dust extractors for grinding available. However, no system for waste disposal. |
| SA Evidences | SA Evidences (1) | SA Score: 1.50 |

3: What is the mechanism for ensuring environmental compliance?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 2: - No mechanism for ensuring environmental compliance | No evidence for monitoring environmental performance. |
| SA Evidences | No Evidences added by SA | SA Score: 0.30 |

4: What % of actions are taken on environmental variances?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: - No improvement observed in environmental variances | No tracker for environmental deviations and no system. |
| SA Evidences | No Evidences added by SA | SA Score: 0.30 |

F3 : Systems for Energy Efficiency

Description

Design or select processes that eliminate or reduce energy consumption

Questions 5

OSA Score 3.65

DA Score 3.65

SA Score 2.95

1: What is the level of planning for energy savings?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|------------------------------------|
| Site Assessment CHANGED | Option 2: No planning for energy savings in place | Plan for energy saving is not done |
| SA Evidences | SA Evidences (2) | SA Score: 0.40 |

2: What is the condition of electric meters?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: -Separate meters are installed in high energy consumption areas and logs are maintained | Separate ct PT Chamber along with meter is Installed.on HT area .However log maintaining is in beginning stage |
| SA Evidences | SA Evidences (2) | SA Score: 0.75 |

3: What is the status of energy management system?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 3: Some basic equipment such as power capacitors installed. No technology investments planned. Efforts are mainly people driven for which they are trained | No plan of energy saving . Arranged power supply of 150 kva,11 k v HT installed. Deposited money. |
| SA Evidences | SA Evidences (2) | SA Score: 0.75 |

4: What is the mechanism for ensuring energy efficiency?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|-------------------------|
| Site Assessment CHANGED | Option 3: - System in place for yearly checking energy efficiency | Energy audit is planned |
| SA Evidences | No Evidences added by SA | SA Score: 0.45 |

5: What % improvement is observed in variances?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---------------------------------|
| Site Assessment CHANGED | Option 4: 50%-75% improvement observed in variances | Monitoring is at initial stages |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

F4 : Systems for Natural Resource Conservation

Description

Design or select processes that eliminate or reduce natural resource use and substitute conventional energy sources with renewable sources

Questions 4 OSA Score 2.65 DA Score 2.65 SA Score 2.65

1: What is the level of focus on natural resource conservation?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 2: -Identification of the natural resources used by the organization, establishing a system of measurement of natural resources consumption | Use of natural light and good ventilation. |
| SA Evidences | SA Evidences (2) | SA Score: 0.40 |

2: What are the various measures implemented for natural resource conservation?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 3: "-Ad-hoc low cost measures for natural resource conservation developed e.g.. Natural lighting, paper re-use, water wastage prevention etc. - People are trained on conservation" | Low cost use of natural resources like natural light and air, available. But list of initiatives and planning not evident. |
| SA Evidences | SA Evidences (1) | SA Score: 1.50 |

3: What is the mechanism for monitoring natural resource conservation?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|---|
| Site Assessment AGREED | Option 3: System in place for half yearly checking of natural resource conservation | List of checking natural resource conservation is available and half yearly monitoring is done. |
| SA Evidences | SA Evidences (1) | SA Score: 0.45 |

4: What % improvement is observed in variances?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 2: <50% improvement observed in variances | Monitoring of variances observed and less than 50% improvement observed. |
| SA Evidences | SA Evidences (1) | SA Score: 0.30 |

G1 : Installation of Environmental Protection and Measuring Systems

Description

Install plant & equipment, monitoring mechanisms required to eliminate, reduce, treat or dispose effluents/emissions and solid wastes as per design for every new process or product line

Questions 3

OSA Score 2.10

DA Score 2.10

SA Score 2.10

1: What is the level of awareness on environmental protection and measuring equipment?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: Training provided on the environmental protection and measuring equipment to key people on the shop floor But commissioning of production units not held up if ETPs or emission control equipment are not ready | Maintenance schedule (including environmental equipments) evident. But calibration activities are not performed. |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

2: What is the status of environmental protection and measuring equipment?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 1: No environmental protection and measuring equipment identified. Main focus is on completion of production plants | Main focus on production plant but no consideration for environment. Some environmental protection equipments are available which are part of production equipments. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

3: What equipment are installed for environmental compliance?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 3: All Necessary equipment deployed in firm | Dust collecors, environment friendly equipments available. But not done proactively. |
| SA Evidences | SA Evidences (2) | SA Score: 1.50 |

H1 : Planned Maintenance of Environmental Management Systems

Description

Ensure the maintenance of equipment installed for environmental control to keep them operational with lowest downtime

Questions 3

OSA Score 0.40

DA Score 0.40

SA Score 1.90

1: What is the approach towards planned maintenance (PM) of environmental management systems?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--|
| Site Assessment AGREED | Option 2: PM plan available for <50% environmental management systems | Preventive Maintenance Schedule is available. Adherence to schedule is less than 50% |
| SA Evidences | SA Evidences (1) | SA Score: 0.40 |

2: What is the % adherence to maintenance plan?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 3: adherence to planned maintenance is <50% | Preventive Maintenance Schedule is available. Adherence to schedule is less than 50% |
| SA Evidences | SA Evidences (1) | SA Score: 1.50 |

3: How do you measure effectiveness of maintenance?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|---|
| Site Assessment AGREED | Option 1: Effectiveness not measured for environmental management systems | No system for measurement of EMS effectiveness. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

K3 : Material Handling Systems

Description

An integrated system of activities, equipment, and procedures related to the moving, storing, protecting and controlling of materials that delivers the required material or product at the designated location at the right time in a safe and controlled manner

Questions 3

OSA Score 1.20

DA Score 1.20

SA Score 1.20

1: What are the design principles of the material handling systems?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 1: - Material handling systems are all manual | Manual material handling system. No automation. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

2: What is the level of training on material handling and hazardous materials?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--------------------------|
| Site Assessment AGREED | Option 1: No training on material handling and hazardous material | No evidence of training. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

3: How do you ensure productivity and quality through material handling systems?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--|
| Site Assessment AGREED | Option 2: - Team organized to identify handling issues each stage, e.g. Material receipt , Inspection/ acceptance, Storage etc. | No plan for material handling system. However material handling issues are identified at each stage. |
| SA Evidences | SA Evidences (1) | SA Score: 1.20 |

O1 : Outgoing Quality Performance Level

Description

Outgoing (customer end) quality performance level / % improvement

Questions 2 OSA Score 3.50 DA Score 3.50 SA Score 2.50

1: What is % of outgoing quality?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: Outgoing quality is < 50% of industry benchmark | test report alongwith Invoice is accompanied to customer. AQL of Customer is met |
| SA Evidences | No Evidences added by SA | SA Score:1.50 |

2: What is the value of customer satisfaction index?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 2: -No System established for measuring customer satisfaction Index | Outgoing Quality is more than 95 % however customer complaint Register need to be established |
| SA Evidences | SA Evidences (1) | SA Score:1.00 |

O2 : In Process Quality Performance Level

Description

In-house quality performance level / % improvement

Questions 2 OSA Score 3.50 DA Score 3.50 SA Score 3.00

1: What is % of in-process manufacturing quality?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 4: In-process mfg. quality is >75-95% of industry benchmark | Test report is accompanied alongwith with each lot. No customer return |
| SA Evidences | SA Evidences (2) | SA Score:2.00 |

2: What is the audit assessment score?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|-------------------------------|
| Site Assessment CHANGED | Option 2: -No system established for measuring in process audit score | System need to be established |
| SA Evidences | No Evidences added by SA | SA Score:1.00 |

P2 : Scrap (% of Gross Sales)

Description

Calculation of amount of scrap generated as a % of total sales

Questions 1 OSA Score 0.00 DA Score 0.00 SA Score 0.00

1: What is the amount of scrap as % of gross sales?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 1: >2% scrap as a %age of gross sales | % scrap is below 2 %of %of gross sales. Proof of balance sheet is shown |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

Q1 : Optimal Use of Natural Resources

Description

Optimal use of natural resources

Questions 1 OSA Score 0.00 DA Score 0.00 SA Score 0.00

1: What is the improvement plan for optimizing use of natural resources?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--|
| Site Assessment AGREED | Option 1: No data exists to optimize use of natural resources | No plan for optimizing use of natural resources. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

Q2 : Energy Performance

Description

Energy Performance

Questions 2 OSA Score 5.00 DA Score 5.00 SA Score 2.00

1: How do you monitor energy performance parameters?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 2: -Energy performance parameters are not fully defined | Energy conservation data with targets need to be defined. |
| SA Evidences | No Evidences added by SA | SA Score:1.00 |

2: What is the % savings in energy consumption?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|----------------------------|--------------------|
| Site Assessment CHANGED | Option 2: No energy saving | Data not available |
| SA Evidences | No Evidences added by SA | SA Score:1.00 |

Q3 : Environmental Performance, Air/Effluent, Solid Wastes

Description

Environmental performance – air/effluent / solid wastes / renewable resource use

Questions 1 OSA Score 0.00 DA Score 0.00 SA Score 0.00

1: How do you monitor environmental performance measures?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 1: Environmental performance measures are not defined and not monitored | No evidence of defining and monitoring environmental performance measures. |
| SA Evidences | No Evidences added by SA | SA Score:0.00 |

R2 : Operating Profit/ % Improvement (Measured as Gross Profit)

Description

Operating profit / % improvement

Questions 1 OSA Score 5.00 DA Score 5.00 SA Score 4.00

1: What is the trend of operating profit growth?

| ANSWER BY | ANSWER | COMMENT |
|--|--|---|
| <i>Site Assessment</i> CHANGED | <i>Option 4:</i> "Growth of 10% in the operating profit over last 3 financial years – Risk management analysis done" | Growth of 10 % observed for last 3 financial years. |
| <i>SA Evidences</i> | SA Evidences (3) | <i>SA Score:</i> 4.00 |

A3 : Low Cost Automation

Description

Replacing manual efforts with alternate mechanized operations developed locally to reduce quality variations, time & cost of operations

Questions 3

OSA Score 4.40

DA Score 4.40

SA Score 3.50

1: What is the awareness on low cost automation?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 2: Low cost automation mainly done to improve productivity by senior management | Senior Management does waste management for profitability |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: What is the scale of automation?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 5: Low cost automation is evident by usage of Pneumatic, hydraulic , electric , hybrid , electronic controlled systems in a wide variety of manufacturing areas | Hydro Pnematic machines are used for increasing the production of moulds |
| SA Evidences | SA Evidences (4) | SA Score: 2.50 |

3: What percentage of improvement goals for low cost automation are met?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: Improvement goals for low cost automation are not measured | Improvement goals are achieved more than 50 %0 |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

B2 : Supplier Development

Description

Identify & develop supplier capability to enable supply of consistent conforming products and services to the organization and for outsourcing non-core activities while meeting the quality and reliability parameters

Questions 3

OSA Score 3.10

DA Score 3.10

SA Score 2.00

1: What is the process of new supplier development?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 2: Material/ data sheet / spec derivation used for new supplier development | Material data sheet available e.g. Pig iron Grade NG62 |
| SA Evidences | SA Evidences (1) | SA Score: 0.40 |

2: What is the process for managing existing suppliers?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 2: No development plan for managing existing suppliers | Supplier development plan not available. No evidence of Supplier audits. |
| SA Evidences | No Evidences added by SA | SA Score: 1.00 |

3: What is the procedure for supplier evaluation?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: No Systemic process in place for supplier evaluation | No systematic process for supplier evaluation. |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

C3 : Planned Maintenance

Description

Scheduled maintenance at fixed intervals, ensuring that the equipment or item is operating reliably at reduced cost and downtime

Questions 4

OSA Score 3.00

DA Score 3.00

SA Score 2.70

1: What is the approach towards preventive maintenance plan ?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 3: Preventive Maintenance plan is available for <50% critical machines | Plant Maintenance approach is available |
| SA Evidences | SA Evidences (1) | SA Score: 0.60 |

2: What is the % adherence to the maintenance plan?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|----------------|
| Site Assessment CHANGED | Option 3: Adherence to planned maintenance plan is <80% | PM is absent. |
| SA Evidences | No Evidences added by SA | SA Score: 0.75 |

3: What is the status of autonomous maintenance activities?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: There is clear understanding of equipment functions and safety risks (Step 0 of autonomous maintenance) | Clear understanding of equipment functions are available |
| SA Evidences | No Evidences added by SA | SA Score: 0.75 |

4: How do you measure effectiveness of maintenance?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|------------------------------|
| Site Assessment CHANGED | Option 2: Effectiveness of maintenance is not measured | MTBF & MTTR system is absent |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

EI: Transportation and Storage

Description

Facilities & methods for storage and transportation are appropriate to ensure product quality is retained till it reaches the customer

Questions 3

OSA Score 2.40

DA Score 2.40

SA Score 1.40

1: What is the level of awareness and training on transport and storage techniques?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 2: Customer needs and requirements for transportation/storage defined and finalized | Customer needs for storage and transportation finalized and listed. |
| SA Evidences | SA Evidences (1) | SA Score: 0.40 |

2: What is the approach towards packaging & transport techniques?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 2: Approach does not exist for packaging and transport | SOP not available for packaging and transport. |
| SA Evidences | No Evidences added by SA | SA Score: 1.00 |

3: How is transportation and storage improved?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--------------------------------|
| Site Assessment AGREED | Option 1: No improvement plan for transportation and storage | No improvement plan available. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

E3 : Customer Education for Product Usage Maintenance and Service

Description

Awareness is given to the user for proper use of the product during its life cycle to ensure that it performs as per requirement

Questions 3

OSA Score 3.70

DA Score 3.70

SA Score 1.90

1: How do you transfer knowledge to customer on product usage, maintenance and services?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|--|
| Site Assessment AGREED | Option 1: There is no documented process/policy of transfer of knowledge on product usage to customers | No documented policy for customer education. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

2: What is % adherence to the customer education process?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|-------------------------|
| Site Assessment CHANGED | Option 2: No adherence to customer education process | No evidences available. |
| SA Evidences | No Evidences added by SA | SA Score: 1.00 |

3: What is the feedback mechanism to ensure effectiveness of the customer education process?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 3: Reactive approach is followed to handle customer queries related to product understanding | No evidence of feedback from customer. However, reactive approach followed in case of reporting by customer. |
| SA Evidences | No Evidences added by SA | SA Score: 0.90 |

E4 : Customer Service

Description

Have processes to provide service to the customer, to meet his post supply needs

Questions 3

OSA Score 3.50

DA Score 3.50

SA Score 3.00

1: How is the customer service function organized?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--|
| Site Assessment AGREED | Option 1: - No separate team for customer service | Customer service function need to be established |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

2: What % of queries are resolved within TAT?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|---|
| Site Assessment CHANGED | Option 3: <50% queries resolved within TAT | Customer query Registered is maintained . Verbal communication is received. |
| SA Evidences | No Evidences added by SA | SA Score: 1.50 |

3: What is the level of robustness of the CAPA in case of complaints?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|-------------------------|
| Site Assessment CHANGED | Option 5: Gaps in customer service identified, corrective actions taken and risk mitigation done to prevent recurrence | CAPA analysis is absent |
| SA Evidences | No Evidences added by SA | SA Score: 1.50 |

H2 : Planned Maintenance of Energy Control Systems

Description

Ensure the maintenance of all equipment installed to keep the energy consumption level at the optimum, prevent energy wastage and leakages

Questions 3

OSA Score 3.50

DA Score 3.50

SA Score 3.90

1: What is the approach towards planned maintenance (PM) of energy control systems?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--|
| Site Assessment CHANGED | Option 4: PM plan for 50%-70% critical energy control systems | PM of energy control system is available. Examples --- crucible with coke using lid. Refractories used in induction furnaces |
| SA Evidences | No Evidences added by SA | SA Score: 0.80 |

2: What is the % adherence to maintenance plan?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---------------------------------------|
| Site Assessment AGREED | Option 5: adherence to planned maintenance is 100% | Adherence to plan maintenance is 100% |
| SA Evidences | No Evidences added by SA | SA Score: 2.50 |

3: How do you measure effectiveness of maintenance?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|--|---|
| Site Assessment AGREED | Option 2: Adherence measured on adhoc basis for energy control systems | List of critical machines is available however system of MTTR & MTB For need to be establishe |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

K1: Plant Layout

Description

Planning for the location of all machines, utilities, employee workstations, material storage areas, pathways, service areas, space necessary for the operation of processes, and for the flow of materials and people movement within plant area

Questions 3

OSA Score 3.40

DA Score 3.40

SA Score 3.10

1: Is the layout design available and appropriately built and revised as per operations requirements?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|--|
| Site Assessment AGREED | Option 2: Specific team established responsible for plant lay outing to ensure layout conducive to linear material flow | Team with owner & technocrat is s part of team .. Machine shop & Foundry machines are arranged to get straight line . All relevant photos are taken during site tour |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: How do you ensure improvements In layout? What are the principles/tools used to improve layout?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 3: People are trained and teams are formed for improvements in layout Specific team established responsible for linear flow | Team comprising owner , & technocrat is formed.Though initial training is a available upgradation of latest technology , system in plant layout is needed |
| SA Evidences | No Evidences added by SA | SA Score: 1.50 |

3: What is the existing format for plant layout?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 4: Option 2 + Layout considers flow from raw material receipt to dispatch point with straight line pathways | All machines and foundry equipment s are arranged with material flow. Photos are uploaded during site tour |
| SA Evidences | SA Evidences (5) | SA Score: 1.20 |

K2 : Material Management

Description

Facilities for the safe and systematic storage under controlled conditions, of raw materials, consumables, spares, in-process material, semi-finished products and assemblies, finished products, packaged products, with due identification, traceability systems to permit easy access and retrieval

Questions 4

OSA Score 4.15

DA Score 4.15

SA Score 2.25

1: What is the level of robustness of the SCM practices? What are the processes involved? Is SOP available for SCM practices?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--|
| Site Assessment CHANGED | Option 2: SCM practices remains unstructured and ill-defined. Individual heroics and working around the system are what makes things happen – Organisational structures are based on the traditional functions not horizontal supply chain processes | No evidence of documented system. No evidence of Approved Vendor List. |
| SA Evidences | No Evidences added by SA | SA Score: 0.40 |

2: What system/techniques are in place to minimize inventory?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|-------------------------------------|
| Site Assessment CHANGED | Option 2: No system in place to minimize inventory | No system for minimizing inventory. |
| SA Evidences | No Evidences added by SA | SA Score: 0.50 |

3: What is % of timely availability of material?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|--|--------------------------------|
| Site Assessment CHANGED | Option 3: 80–90% timely availability of material | % timely delivery is 80 to 90% |
| SA Evidences | SA Evidences (2) | SA Score: 0.75 |

4: What is the existing inventory management system?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|--------------------------------|
| Site Assessment CHANGED | Option 2: –Higher inventory levels are maintained to ensure there are no stock-outs | No inventory management system |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

N1: Trademark

Description

Safe guarding organizational logo/ brand logo for individual products

Questions 3

OSA Score 1.80

DA Score 1.80

SA Score 1.40

1: What is the scale of branding efforts?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|----------------------------------|
| Site Assessment AGREED | Option 2: Limited understanding of brands | Limited understanding of brands. |
| SA Evidences | No Evidences added by SA | SA Score: 0.60 |

2: Have the trademarks been registered?

| ANSWER BY | ANSWER | COMMENT |
|---------------------------|---|----------------------|
| Site Assessment AGREED | Option 1: No knowledge of IPRs, may violate intellectual property rights of others. No Trademark /logo obtained from relevant authorities | No knowledge of IPR. |
| SA Evidences | No Evidences added by SA | SA Score: 0.00 |

3: What is the level of awareness on trademarks?

| ANSWER BY | ANSWER | COMMENT |
|----------------------------|---|---|
| Site Assessment CHANGED | Option 2: No awareness about IPRs Potential for Violation of intellectual property rights of others | No knowledge of IPRs and its effect to others in case of violation. |
| SA Evidences | No Evidences added by SA | SA Score: 0.80 |

Closing Meeting



Closing Meeting Photo

Participants (6)

PRASHANT BHASKAR MARATHE - Lead Assessor

Sharad Shankar Javalkar - Assessor

Mr. Vijaya Kumar - Proprietor

Mr. Nagraj - CNC Programmer

Mr. Satish Kulkarni - Maintenance Engineer

Mr. Maruti Hosur - Production Manager