

2009

QUALITY ASSURANCE
&
QUALITY CONTROL



PETROLCOMET SERVICES

9/1/2009





TABLE OF CONTENTS

MANAGEMENT RESPONSIBILITY4

ORGANIZATION4

MANAGEMENT RESPONSIBILITY6

MANAGEMENT RESPONSIBILITY10

MANAGEMENT RESPONSIBILITY12

QUALITY SYSTEM13

CONTRACT REVIEW14

DESIGN CONTROL15

DOCUMENT CONTROL17

PURCHASING18

PRODUCT IDENTIFICATION AND TRACEABILITY20

PROCESS CONTROL21

INSPECTION & TESTING22

INSPECTION, MEASURING & TESTING EQUIPMENT23

INSPECTION AND TEST STATUS24

CONTROL OF NON-CONFORMING PRODUCT25

CORRECTIVE AND PREVENTIVE ACTION26

HANDLING, STORAGE, PACKAGING, PRESERVATION AND DELIVERY27

QUALITY RECORDS28



MANAGEMENT RESPONSIBILITY

ORGANIZATION

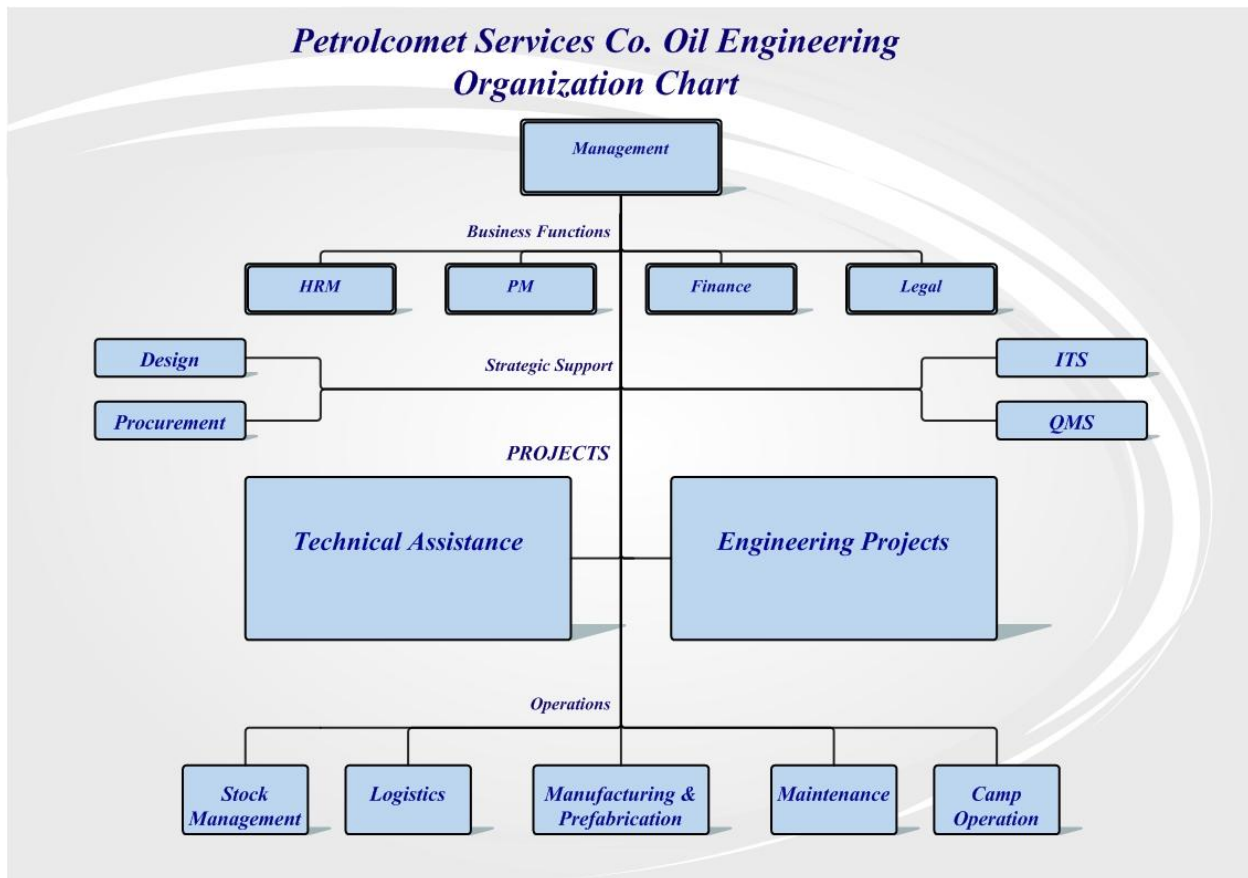
1.1. RESPONSIBILITY AND AUTHORITY

- 1.1.1. This Manual defines the Company's Management policies with regard to the application of Quality Assurance systems in all areas of activity which have influence on the quality of the product. The objectives are to provide products with fitness for purpose at acceptable cost, in accordance with the Contract Specifications.
- 1.1.2. This Quality Manual is to be used as a reference document and outlines the international terms operated.
- 1.1.3. Implementation of the policies defined herein is by means of operating procedures which define responsibilities and detail the essential controls that must be exercised in carrying out the various activities during the course of a contract.
- 1.1.4. To minimize revision of this Manual, reference is not made in the text to individual procedures, but to the particular series of procedures in which the required control is located. The Manual, therefore, will only be subject to revision in the event of a significant change in Company Policy.
- 1.1.5. The functions of this Manual are to:
- a) Define the management policies with respect to Quality Assurance, and to enable identification of the series of procedures, which specify the controls for the various elements of the QA system.
 - b) Ensure uniformity of understanding and performance.
 - c) Provide a training document and to ensure continuity of the systems, when personnel change.
 - d) Act as a reference base, against which the practices and procedures can be audited both internally and externally and corrective action taken when non-conformance is found.
- 1.1.6. Copies of this Manual are readily available to Clients for information purposes. It is, however, PETROLCOMET SERVICES policy that the detailed procedures, by which the Quality Program is implemented, are confidential Company Documents. They are not distributed externally for review. Department procedures are available at PETROLCOMET SERVICES premises for Client's representatives to carry out evaluation and audit. The Company's organization, lines of responsibility and communication are defined and documented.



- 1.1.7. Department Managers are responsible for the standard of work produced within their departments. Responsibility and accountability of departments remain always with the manager of the department, irrespective of delegation of duties. Department Managers must not delegate to a subordinate a duty beyond the limitations of the subordinate's experience and competence.
- 1.1.8. Department Managers are responsible for informing ad members of their department of the scope and implementation of the procedures as lay down in this Manual. Department Managers are responsible for assessing the performance of all members of their department on a regular basis and to make recommendations for training to be given as necessary to maintain the required level of competence.
- 1.1.9. The Company Organization applicable at issues of this Manual is shown in an Organogram for illustration purposes. When required by Contract, the organization specific to a contract will be defined by a job specific organization chart.

Fig. 1.1





MANAGEMENT RESPONSIBILITY

1.2. VERIFICATION. RESOURCES AND PERSONNEL

1.2.1. MANAGING DIRECTOR (MD)

The Managing Director has final control and responsibility.

The Managing Director will overview all Departments and Project teams through regular contact and meetings.

The Managing Director will also advise and confirm the Procurement strategy with relevant Directors and Managers on a job by job basis.

1.2.2. PROJECTS DIRECTOR (PD)

The Projects Director is directly responsible to the Managing Director for providing advice on Project Engineering matters, with a liaison responsibility with the Contracts, Engineering and Finance Directors. He will also be responsible for management of one of the Project teams. He will advise the other Project Team Managers leading other teams on technical and project related procedures.

The Projects Director is also responsible for the technical aspects of Construction Management/Supervision and liaising with the Quality Manager on quality planning.

1.2.3. ENGINEERING DIRECTOR (ED)

The Engineering Director is directly responsible to the Managing Director for Proposals. Process and Structural Design and Instrument and Controls, including Engineering and Technical integrity for all disciplines on all contracts, with a liaison responsibility to the Project Team Managers to ensure and assist designated Engineer(s) to correctly interpret the engineering and technical requirements of each Contract Specification by way of latest issue of designs, standards and specifications.

1.2.4. FINANCE DIRECTOR (FD)

The finance Director is directly responsible to the Managing Director and has responsibility for the overall financial control of the Company. He is responsible for the preparation of monthly management accounts and annual statutory accounts; liaison with the Company's Bankers; monitoring the Company's cash flow position; co-ordination and specification of the Company's information/technology requirements' liaison with the Tax Authorities.

The Finance Director will, in conjunction with the individual Project Team Managers, monitor all Project team budgets to estimates previously agreed at the strategy meetings.



1.2.5.CONTRACTS DIRECTOR (CD)

The Contracts Director is directly responsible to the Managing Director for providing advice on contractual, commercial and legal matters with a liaison responsibility with the Projects, Engineering and Finance Directors. He will also be responsible for management of one of the Project teams. He will advise the other Project Team Managers leading the other teams, on contractual, commercial and legal matters.

1.2.6.SALES DIRECTOR (SD)

The Sales Director is directly responsible to the Managing Director for all Sales, Estimating, Spare Business, and Business Development matters with liaison responsibilities to the Engineering, Finance, Project and Contracts Directors.

The Sales Director is responsible for procuring new business, for providing sales reports and ensuring that future Clients are aware of Boustead's continuing presence in the market place. The Sales Director is responsible for ensuring that all enquiries and tenders are processed correctly within the Boustead organization.

1.2.7.PROJECT TEAM MANAGERS (PTM)

Project Team Managers are the Project Team Leaders and, along with the Projects Director and Contracts Director, are directly responsible to the Managing Director for the management, control of planning, scheduling, budget and technical content for each assigned contract by way of the latest issue of designs, standards and specifications. This also includes, within the specified timescale:

- Job Instructions to the supporting departments
- Technical contents of purchase order Requisition Packages
- Bid Tab approvals
- Reviewing, approving and issuing of drawings and technical documents for Client approval
- Liaison with Client
- Variation Agreements and reporting
- Maintenance of all records relevant to the issue and receipt of information affecting design.
- Technical aspects of inspection, quality control and construction.

Each Project Team Leader (being either a Contracts or Projects Director or a Project Team Manager) will, together with the Personnel Manager and Lead Draughtsman, be responsible for selecting and employing Drawing Office personnel or, with the Procurement Manager, sub-letting drawings for its team, in liaison with, and subject to, the human resource advice, selection and approval procedure laid down by the Personnel Manager.



Each Project Team Leader will be assigned and/or share the following members of staff:

- Design Engineer (Process Specialist)
- Engineers
- Materials Management Specialist
- Shipping Specialist
- Draught person

1.2.8. PROJECT ENGINEERS (PE)

Project Engineers are directly responsible to the Project Team Leaders (PD/CD/PTM) for design, engineering and technical content of assigned contracts by way of the latest issue of designs, standards and specifications. This also includes preparing the technical contents of purchase order requisitions; reviewing, approving and issuing of drawings and technical documents for Client approval; maintenance of all records relevant to the issue and receipt of information affecting design; technical aspects of inspection and quality control and construction, and for specified actions listed in 1.2.7 above.

This also applies to Specialist/Instrument and Control Engineers and Structural Engineers assigned to any of the above tasks by the Engineering Director.

1.2.9. PROCESS DESIGN ENGINEER (PDE)

The Design Engineer is directly responsible to the Engineering Director for the Engineering and Technical integrity of each allocated tender prepared by the Sales Department comprising design, engineering, material selection, technical integrity by way of the latest issue of designs, standards and specifications.

The Design Engineer will act as a checker of other Design Engineers' job specific calculations prior to issue.

Each Project team will be allocated a Design Engineer who will be involved in project requisition of specialist equipment and will act as a service provider to the team, carrying through the background information from the initial sales design/negotiation stage.

1.2.10. SPECIALIST/INSTRUMENT ENGINEERS (IE)

Specialist/Instrument and Control Engineers are responsible to the Engineering Director for providing sales and estimating information relevant to instrumentation requirements. They will act as a service provider to the Project teams to ensure continuation at the project stage.



1.2.11. STRUCTURAL DESIGN MANAGER (SDM)

The Structural Design Manager is responsible to the Engineering Director for the computer analysis and manual calculations of structural and casting design, lifting and transportation, and liaison with Drawing Office in respect to the agreed vetting and structural approvals of drawings.

1.2.12. PROCUREMENT MANAGER (PM)

The Procurement Manager is responsible to the Managing Director for all purchasing, materials management and shipping activities, including spares orders, and the placement of supervision services.

1.2.13. CONSTRUCTION MANAGER (CM)

Construction Manager/Supervisor is directly responsible to the Project Team Manager for all construction activities at each job site.

The Construction Manager/Supervisor is responsible for ensuring the safe and proper execution of all construction works at site from receipt of technical information relating to the actual works to compliance with the Site Agreement, Site Conditions, Standards, Quality, Health and Safety at Work, integrity of Construction and final inspection prior to acceptance by the Client.

The Construction Manager/Supervisor has a liaison responsibility with the assigned Project Engineers for technical definition and the Procurement Manager for the day-to-day control and organisation of assignments.

1.2.14. DOCUMENT CONTROL (DC)

The Document Control person allocated to the Project teams, is responsible for distributing and recording the engineering and technical documentation of all Contracts from Contract Award through to Contract Completion in accordance with the relevant quality procedures.

Maintenance of the computerized Document Control Systems is the responsibility of the Systems Engineer, see 1.2.15.

1.2.15. SYSTEMS ENGINEER

The Systems Engineer is responsible to the Finance Director for the administration and maintenance of the telephone and computer systems, including Document Control.

The duties include investigation/recommendation of new IT systems, the implementation of changes, provision of training, support and assistance to users of the systems.



MANAGEMENT RESPONSIBILITY

1.3. QUALITY MANAGER (MANAGEMENT REPRESENTATIVE)

1.3.1. The Quality Manager is the Management Representative reporting directly to the Managing Director on all Quality Matters, and has the responsibility for ensuring that the requirements of the Quality system, as documented in this Manual, are implemented and maintained. He will discharge this responsibility by:

- 1.3.1.1. Resolving any non-conformance in the System.
- 1.3.1.2. Ensuring that timely and effective action is taken by the appropriate Head(s) of Department to ensure compliance with these requirements.
- 1.3.1.3. Coordinating and monitoring the Quality Control System.

1.3.2. The Quality Manager will carry out the Quality Assurance function by:

- 1.3.2.1. Dealing with quality matters relating to documentation and certification.
- 1.3.2.2. Ensuring that all Contract Quality Plan Witness Points and Hold Points and Tests required are detailed on the Contract Quality Plan, and that any items requiring signature have their documentation stamped or signed accordingly before proceeding to the next task. He will discharge this responsibility by administering Quality Control (Inspection) Personnel function in accordance with Company objectives and standards.
- 1.3.2.3. Ensuring that all documentation is held and maintained throughout the duration of the Contract. The Quality Manager will also ensure that all inspection, test and control records have been duly certified. The Quality Manager will assimilate and maintain this documentation in the form of Material Data Dossier and the Company will maintain this documentation in storage for a minimum period of six (6) years.
- 1.3.2.4. The Quality Manager will supervise the control of inspection, measuring and test equipment, where applicable.
- 1.3.2.5. The Quality Manager will carry out the external Quality Audits or delegate qualified personnel.
- 1.3.2.6. The Project Team Manager has the responsibility for ensuring that each Contract is provided with a full and complete Quality Plan at the commencement of each Contract.



1.3.2.7. The Quality Manager is particularly responsible for:

Ensuring that all quality-related disciplines and procedures are carried out in accordance with PETROCOMET SERVICES specification and requirements

- Implementing and auditing the Quality systems
- Maintenance of this Quality Manual and Audit Programme
- Vendor assessment
- Sellers' QA/QC Documents and Procedures and Data Dossiers
- Quality Audits (external and internal)
- Non-conformities and defect analysis
- Quality Plans/Inspection Check lists
- Approval of Shipping Release
- Monitoring and maintaining in-house Quality Documentation
- Controlling inspection costs within the defined budgets

The Quality Manager has the authority to hold/quarantine any product which does not meet the required specification.

1.3.2.8. QUALITY CONTROL PERSONNEL

The responsibilities and authority of personnel primarily responsible for Quality Control are defined in the appropriate documents and are fully covered in job description and/or terms of reference documents.

The Project Team Managers are responsible for technical definition and the Quality Manager is responsible for the day-to-day control and organization of Quality Control personnel.

1.3.2.9. TECHNICAL LIBRARY

1.3.2.9.1. Quality Department is responsible for keeping, maintaining and updating the Technical Library records.

1.3.2.9.2. The Technical Library holds records of general and specific information with regard to current codes and standards. The records are constantly reviewed to ensure that any changes and amendments to these codes and standards are maintained at the latest revision.



MANAGEMENT RESPONSIBILITY

1.4. MANAGEMENT REVIEWS

Management Review meetings will be convened by the Managing Director or any Director of the Company or by the Quality Manager.

The meeting will be chaired by the Managing Director where possible (or any Director or the Quality Manager) and scheduled. The purpose of this is to consider results obtained from internal and external audits of work activities/client complaints and to review the suitability and effectiveness of the quality system in order to ensure its continued efficiency in line with the Company's quality policy.

Recommendations for change will be implemented as deemed necessary to maintain continued improvement.

The Management Review of the quality system will take place at 4-monthly intervals.

Standard Agenda to be as follows:

1. Matters arising from previous review,
2. Results of internal audits since last review.
3. Review of effectiveness of preventive actions.
4. Results of QA on vendors
5. Complaints from customers.
6. Future plans/changes/improvements.
7. Safety Management System.



QUALITY SYSTEM

2.1. The Company's Quality System is established, maintained and documented in the Quality Assurance Manual, supported by the Quality Procedure Manuals.

These Manuals serve to determine the organizational structure, responsibilities procedures, processes and resources for implementing Quality Management as formally expressed by the Senior Management.

2.2. For contractual, mandatory and assessment purposes, demonstration of the implementation of identified elements in the Quality System shall be required from each Department concerned with quality of product or service.

2.3. The Quality System will be updated as necessary, to ensure it is understood and effective.

2.4. These Procedures are confidential and not for external distribution. The exception to this is when authorized client audit teams carry out audit reviews.



CONTRACT REVIEW

- 3.1. All Purchase Orders/Contracts are reviewed by the Engineering Director and/or Sales Director prior to acceptance, to ensure that:
 - 3.1.1. The requirements are adequately defined and documented.
 - 3.1.2. PETROLCOMET SERVICES has the capability to meet the contractual requirements.
 - 3.1.3. Any deviations from, or clarifications to, the Purchase Order/Contract and PETROLCOMET SERVICES understanding of the "as-sold" condition are raised with the Client and highlighted during the internal handover meeting.
 - 3.1.4. Any special quality assurance requirements within the contract are identified and action taken to ensure compliance.
- 3.2. An internal Sales handover meeting is arranged, at which the contract is discussed and reviewed by the relevant department representatives, in accordance with Sales Handover Procedures.
- 3.3. Amendments to contracts shall be reviewed and details of the relevant changes shall be notified to all parties affected by the change.



DESIGN CONTROL

- 4.1. The Company has established, and will maintain, procedures to control, verify and validate the design of the product, in order to ensure that the essential quality and regulatory specified requirements for safety, performance and dependability are met.
- 4.2. It is company policy to draw up plans that identify the responsibility for each design and development activity. The plans shall describe or reference these activities and shall be updated as the design evolves.

The design and verification activities shall be planned and assigned to qualified personnel equipped with adequate resources.

- 4.3. Organizational and technical interfaces between the different departments shall be identified and the necessary information documented, transmitted and regularly reviewed.
- 4.4. Design Input

Design input requirements typically in the form of product requirement specifications and/or product description with specifications relating to configuration, composition, incorporated elements, and other design features relating to the production, including applicable statutory and regulatory requirements, shall be identified, documented and their selection reviewed by the company. The results of the contract reviews shall be taken into consideration.

All applicable design inputs such as performance, function, descriptive, environmental and safety shall be defined, reviewed and recorded.

Incomplete or conflicting requirements shall be resolved with those responsible for drawing up these requirements.

- 4.5. Design Output

Design output shall be documented and expressed in terms of requirements, calculations and analyses in the form of data sheets, drawings, parts lists, specifications and instructions.

Design output shall:

- 4.5.1. Meet the design input requirements,
- 4.5.2. Contain or reference acceptance criteria,
- 4.5.3. Conform to appropriate regulatory requirements whether or not these have been stated in the input information,
- 4.5.4. Identify those characteristics of the design that are crucial to the safe and proper functioning of the product,
- 4.5.5. Be reviewed before release.



4.6. Design Review

Formal documented design reviews shall be planned and conducted at appropriate stages by competent personnel and attended by representatives of all functions concerned with the design stage being reviewed. Records of the reviews shall be maintained.

4.7. Design Verification

4.7.1. It is company policy to plan, establish, document and assign to competent personnel functions for verifying the design.

4.7.2. Design verification shall establish that design output meets the design input requirement by means of design control measures as laid down in the design procedures and the following:

- 4.7.2.1. holding and recording design verifications,
- 4.7.2.2. undertaking qualification tests and demonstrations,
- 4.7.2.3. carrying out alternative calculations,
- 4.7.2.4. comparing the new design with a similar proven design, if available,
- 4.7.2.5. Reviewing the design stage documents before release.

4.8. Design Validation

Design validation shall compare the product against the user's requirements as stated at the contract review stage.

4.8.1. Design validation may be performed prior to product completion.

4.8.2. Design validation will be performed under defined conditions.

4.8.3. Multiple validations may be performed if there are different intended uses.

4.8.4. Results of examinations, tests and demonstrations shall be included in the records.

4.9. Design Changes

The Company have established, and maintain, procedures for the identification, documentation and appropriate review and approval of all changes and modifications before their implementation.



DOCUMENT CONTROL

- 5.1. The Company PETROLCOMET SERVICES has established, and maintains, procedures to control the circulation and record of all Key Documentation. These documents and data are reviewed and/or approved for adequacy by authorized personnel prior to issue, as I required.
- 5.2. These procedures ensure that:
 - 5.2.1. Latest Revisions of Documents are recorded as available for use by other personnel, where essential for them to carry out the performance of their assigned task.
 - 5.2.2. Superseded Revisions of Documentation are promptly removed from all places of issue or stamped "Superseded".
 - 5.2.3. Changes to Documents are checked and/or approved by authorized personnel. The authorized personnel have access to all relevant background information upon which their check and/or approval is based.

Changes to Documents are checked and/or approved by authorized personnel. The authorized personnel have access to all relevant background information upon which their check and/or approval is based.
 - 5.2.4. Master or Contract Document lists are established to identify the latest Revision of Documents in order to preclude the use of obsolete/superseded Documents.
 - 5.2.5. Documents and data are re-issued, after each change has been made and the latest Revision Number recorded.
- 5.3. All drawings and technical data, to and from outside sources, are received by Document Control who record the input of this information on to the computer system, in accordance with the company procedures, and distribute the documentation.



PURCHASING

- 6.1. The ability to meeting customer's requirements can be affected by the quality of purchased materials and services. Therefore, selection and control of the purchased materials and services is vital to the finished product.

It is Company Policy to ensure that purchased product conforms to specified requirements.

6.2. ASSESSMENT OF SUB-CONTRACTORS

6.2.1. The Company selects sub-contractors on the basis of their ability to meet subcontract requirements, including quality requirements.

6.2.2. The selection of sub-contractors, and the type and extent of control exercised by the Company, shall be dependent upon the type of product and, where appropriate, on records of sub-contractors' previously demonstrated capability and performance and by audit reports.

6.2.3. The Company also ensures that the quality system controls of the sub-contractor are effective before any order is placed.

6.2.4. The Company has established, and maintains, records of approved subcontractors.

6.3. PURCHASING DATA

Purchasing documents shall contain data clearly describing the product ordered, including, where applicable:

6.3.1. The specific amount and the precise description of the material/component/service required, including any quality assurance/quality control activities that may be necessary.

6.3.2. The title or other positive identification, and revision status of specifications drawings, process requirements and other relevant technical data, including requirements for approval or qualification of product, procedures, process equipment and personnel.

6.3.3. The title, number and issue of the quality system International Standard to be applied to the product.

- 6.4. The Company assign appropriate personnel to review and approve all purchasing documents for accuracy of specified requirements prior to release.



6.5. VERIFICATION OF PURCHASED PRODUCT

6.5.1. Where specified in the contract, the Purchaser or his representative shall be afforded the right to verify at source, or upon receipt, that the purchased product conforms to specified requirements. Verification by the Purchaser shall not solve the Company of the responsibility to provide acceptable product nor shall preclude subsequent rejection.

6.5.2. When the Purchaser or his representative elects to carry out verification at the sub-contractor's plant, such verification shall not be used by the Company as evidence of effective control of quality by the sub-contractor. The verification arrangements and the method of product release shall be specified in the purchasing documents.

6.6. PURCHASER SUPPLIER PRODUCT

The Company shall establish, and maintain, procedures for verification on receipt identification, storage and maintenance of client-supplied product, provided for incorporation into the supplies. Any such product that is lost, damaged or is otherwise unsuitable for use shall be recorded and reported to the client.

Verification by the Company does not absolve the client of the responsibility to provide acceptable product.



PRODUCT IDENTIFICATION AND TRACEABILITY

7.1. PRODUCT IDENTIFICATION AND TRACEABILITY

Identification and traceability requirements are subject to individual Contract variations.

Procedures stating the requirements for identifying materials and products from applicable drawings, specifications, material certification and other data are either supplied by the client at tender stage, developed Contract specific or contained in PETROLCOMET SERVICES sub-contractor's approved procedures.

Whichever method used is subject to review and client approval (where applicable) and identified on the appropriate quality plan.

7.2. RESPONSIBILITY

The Project Director and designated Project Team Manager will be responsible for establishing and agreeing, in conjunction with the Quality Manager, the methods of identification and traceability with the client during tender, pre- or post-contract stages of negotiation.



PROCESS CONTROL

- 8.1. The Company shall identify, and plan, the production/design and, where applicable, installation processes which directly affect quality, and shall ensure that these processes are carried out under controlled conditions.

The Company will provide:

- 8.1.1. Documented procedures defining the manner of production and installation, using sub-contractors with suitable production and installation equipment, suitable working environment, in compliance with reference standards/codes and quality plans,
 - 8.1.2. Monitoring and control of suitable process parameters and product characteristics during production and installation,
 - 8.1.3. The approval of processes and equipment, as appropriate,
 - 8.1.4. Criteria for workmanship which shall be stipulated, to the greatest practicable extent, in written standards.
 - 8.1.5. Special process procedures shall be submitted to PETROLCOMET SERVICES by their sub-contractors for review, and then passed to PETROLCOMET SERVICES Clients for approval before production may commence. These processes may include, but not be limited to, welding forming, post weld heat treatment, pressure testing, non-destructive testing refractory installation and surface treatment.
- 8.2. Current project specifications are held by the assigned Project Team Managers and/or Project Engineers as part of the work instructions.



INSPECTION & TESTING

The Company ensures that incoming product is not used or processed until it has been inspected or otherwise verified as conforming to specified requirements. Verification shall be in accordance with the quality plan and documented procedures and drawings.

- 9.1. Where incoming product is released for urgent production purposes, it shall be positively identified and recorded in order to permit immediate recall and replacement in the event of non-conformance to specified requirements.

In determining the amount and nature of receiving inspection, consideration is given to the control exercised at source, documented evidence of quality conformance provided, and whether the sub-contractor is a ISO 900C Series accredited company.

- 9.2. For in-process inspection and testing the Company will:

- 9.2.1. Inspect, test and identify product as required by the quality plan or documented procedures, ensuring that all hold/witness points have been signed off by the PETROLCOMET SERVICES Inspector and Client and, where applicable, third party inspection,

- 9.2.2. Establish product conformance to specified requirements by use of process monitoring and control methods and interim inspection reports as per Quality Plan,

- 9.2.3. Hold product until the required inspection and tests have been completed or necessary reports have been received and verified except when product is released under positive recall procedures. Release under positive recall procedures shall not preclude the activities outlined above,

- 9.2.4. Identify non-conforming product.

- 9.3. The quality plan or documented procedures for final inspection and testing shall require that all specified inspection and tests, including those specified either on receipt of product or in-process, have been carried out and that the data meet specified requirements.

- 9.4. The Company shall carry out all final inspection and testing in accordance with the quality plan or documented procedures to complete the evidence of conformance of the finished product to the specified requirements.

- 9.5. No product shall be dispatched until all the activities specified in the quality plan or documented procedures have been satisfactorily completed and the associated data and documentation is available and authorized and a release note issued.

An internal shipping release, signed by Quality Manager and relevant Project Team Manager, is issued to the Shipping Department, allowing shipping instructions to be issued.

The Company have established, and maintain, records which give evidence that the product has passed inspection and/or test with defined acceptance criteria.



INSPECTION, MEASURING & TESTING EQUIPMENT

- 10.1. The Company shall carry out a test program on all software used on the process design calculations produced on the in-house computer.

This proven test program shall be carried out on a regular basis.

- 10.2. All results are recorded and documented.
- 10.3. The test program will be up-dated and verified according to requirements.
- 10.4. The computer program is backed up on a regular basis to forestall loss of information.
- 10.5. In the event of a failure of any relevant hardware, an immediate test program initiated.
- 10.6. The calibration of all other inspection, measuring and test equipment is the responsibility of PETROCOMET SERVICES sub-contractors and will be verified by PETROCOMET SERVICES inspectors. The control procedures are subject to assessment when quality audits are undertaken by PETROCOMET SERVICES Quality Department. All records shall be fully documented and maintained.
- 10.7. When specified as a requirement, Technical Data will be made available to verify that inspection, measuring and test equipment is functionally adequate.



INSPECTION AND TEST STATUS

- 11.1. The Company shall ensure that their sub-contractors have the inspection and test status of products identified by using marking, various stamps, tags, labels, root cards and inspection records.
- 11.2. Inspection reports provide the status details, and the Company monitors by means of status reports issued from the Procurement Department.
- 11.3. The Quality Plan shall define the means of verifying the inspection or test status, to ensure only products that have passed the required inspections and tests are dispatched, used or installed, unless released under an authorized concession.
- 11.4. All Company projects are monitored by the above method.
- 11.5. Records shall identify the inspection authority responsible for the release of a product.



CONTROL OF NON-CONFORMING PRODUCT

- 12.1. The Company, in collaboration with their sub-contractors, will establish and maintain documented procedures to ensure that any product that does not conform to specifications is precluded from use or installation.
- 12.2. Any non-conforming items found during inspections will be clearly marked, labeled or tagged, and a non-conformance report (NCR) issued. These items will be quarantined until such time as:
 - 12.2.1. Re-work or repair is authorized,
 - 12.2.2. A concession is granted,
 - 12.2.3. Complete rejection and scrapping is authorized.
- 12.3. Full records of all non-conformities will be maintained.
- 12.4. Any non-conformance resulting in a customer complaint will be fully investigated and documented. Records will be kept and used in statistical reports for further evaluation.



CORRECTIVE AND PREVENTIVE ACTION

- 13.1. The Company shall implement corrective and preventive action in accordance with its documented procedures.
- 13.2. The Company requires that any problem identified that could affect the quality of products or services provided by the Company be properly investigated, documented by the use of non-conformance reports (NCR) and/or inspectors' reports and that appropriate steps are taken to determine the corrective action needed to eliminate the cause of the non-conformity.
- 13.3. Any non-conformance shall be reviewed in accordance with PETROLCOMET SERVICES and/or their sub-contractor's procedures. It may be :
 - 13.3.1. Reworked to meet specifications,
 - 13.3.2. Accepted by concession with or without repair,
 - 13.3.3. Rejected and/or scrapped.
- 13.4. Any NCR requiring rework will be recorded and documented.
- 13.5. Any concession granted will be fully documented.
- 13.6. Any rejection resulting in scrapping will be recorded.
- 13.7. All products that undergo any form of rework will be re-inspected in accordance with documented procedures, to the degree appropriate to the magnitude of the problem.
- 13.8. Results of all products that have required corrective action will be duly recorded in the Discrepancy Log.
- 13.9. The Quality Manager shall be notified in writing of all clients' complaints and these will be handled in accordance with documented procedures.
- 13.10. As preventive action the Company shall:
 - 13.10.1. Analyze all appropriate sources of information which affect product quality to detect and eliminate potential causes of non-conformities,
 - 13.10.2. Determine actions needed to deal with any problems requiring preventive action and apply controls to ensure they are effective,
 - 13.10.3. Submit for management review relevant information on actions taken.



HANDLING, STORAGE, PACKAGING, PRESERVATION AND DELIVERY

- 14.1. The Company has established documents and maintains procedures, for handling, storage, packaging preservation and delivery of product to prevent abuse, misuse, damage, deterioration or loss of materials.
- 14.2. The Company procedure details these methods and is transmitted to the sub-contractors, unless a job specific procedure is required.
- 14.3. Where applicable, to prevent damage or deterioration, designated storage areas or stockrooms will be used, prior to use or delivery.
- 14.4. Receipt and dispatch from these areas will be in accordance with documented procedures.
- 14.5. All activities are primarily under the control of the fabricator whose instructions are formally provided in the purchase order placed on them.
- 14.6. When specified, goods in storage will be inspected at suitable intervals, to determine deterioration.
- 14.7. Where necessary, shipments are fully inspected prior to loading at fabricator's works, or, where packing is not required (i.e. due to size of equipment) the loading is supervised by PETROCOMET SERVICES personnel before delivery to site/delivery point.
- 14.8. The shipping/dispatch of goods shall be authorized by the Shipping Department on receipt of the relevant shipping release note and dispatch documentation.



QUALITY RECORDS

- 15.1. The Company has established, and maintains, procedures for identification collection, indexing, filing, storage, maintenance and disposition of quality records.
- 15.2. Quality records shall be maintained to demonstrate achievement of the required quality and the effective operation of the quality system. Pertinent sub-contractor quality records shall be an element of these data.
- 15.3. All quality records shall be legible and identifiable to the product involved. Quality records shall be stored and maintained in such a way that they are readily retrievable in facilities that provide a suitable environment to minimize deterioration or damage and to prevent loss. Retention times of quality records shall be established and recorded. Where agreed contractually, quality records shall be made available for evaluation by the Purchaser or his representative for an agreed period.
- 15.4. All quality records are kept on file in Central Filing for a minimum period of 6 years.
- 15.5. MATERIAL DATA DOSSIER/TECHNICAL DATA MANUAL / CONSTRUCTION/ERECTION PROCEDURE

The Dossier / Manuals / Construction/Erection Procedures for each completed project is (are) located in Central Filing for a minimum period of six years.

Records for equipment subject to CDM requirements must be held for the life of the equipment.

Records for equipment subject to CE marking must be held for ten years.

15.6. DRAWING RECORDS

Current Project(s) drawings are located in the Drawing Office cabinets at the latest revisions. Client comment prints, superseded or obsolete revisions of current Project(s) drawings are withdrawn and held in the Drawing Office central filing area.

All drawings for completed projects are withdrawn from the Drawing Office cabinets and located in the Drawing Office central filing area.

Records are kept of the final issue of all arrangement drawings for each project (as-built status) in the data dossiers.

15.7. SPECIFICATION RECORDS

Current Project(s) specifications are held by the assigned Project Team Managers and/or Project Engineers, as part of the work instructions, at the latest revisions. Client changes to specification, superseded or obsolete revisions of current. Project(s) specifications are withdrawn from the current Job File, stamped "superseded" and held until contract completion.

All specifications for completed projects are withdrawn from the Engineer's filing system and located in Central Filing for a minimum period of six years.

