



CUSTOM METALS INC.

MARCON CUSTOM METALS
QUALITY ASSURANCE MANUAL

TO MEET REQUIREMENTS OF CSA Z299.4


This copy has been supplied to: _____

On: _____

Controlled Copy: _____

Non-Controlled Copy: _____

✓ JF

MARCON CUSTOM METALS INC.	TABLE OF CONTENTS	ISS: 1	REV: 3
Page: 1 of 4	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

A. TABLE OF CONTENTS

B. PREFACE

1.0 GENERAL

1.1 Policy and Objectives

1.2 Statement of Quality Inspection Program Certification

1.3 Definitions

1.4 Quality Assurance Manager (Q.A.M.) Appointment

1.5 Organizational Chart

2.0 TENDER AND CONTRACT

2.1 Purpose

2.2 Scope

2.3 Responsibility

2.4 Procedure

3.0 MEASURING AND TESTING EQUIPMENT

3.1 Purpose

3.2 Scope

3.3 Responsibility

3.4 Procedure

MARCON CUSTOM METALS INC.	TABLE OF CONTENTS	ISS: 1	REV: 3
Page: 2 of 4	REVIEWED BY: JF	APPROVED BY: [Signature]	DATE: 2005/08/10

4.0 INSPECTION AND TEST

4.1 Purpose

4.2 Scope

4.3 Responsibility

4.4 Procedure

5.0 THE INSPECTION AND TEST CHECKLIST

5.1 Purpose

5.2 Scope

5.3 Responsibility

5.4 Procedure

6.0 IDENTIFICATION

6.1 Purpose

6.2 Scope

6.3 Responsibility

6.4 Procedure

7.0 SPECIAL PROCESSES

7.1 Purpose

7.2 Scope

7.3 Responsibility

7.4 Procedure

MARCON CUSTOM METALS INC.	TABLE OF CONTENTS	ISS: 1	REV: 3
Page: 3 of 4	REVIEWED BY: <i>JF</i>	APPROVED BY: <i>[Signature]</i>	DATE: 2005/08/10

8.0 QUALITY RECORDS

8.1 Purpose

8.2 Scope

8.3 Responsibility

8.4 Procedure

9.0 NONCONFORMANCE

9.1 Purpose

9.2 Scope

9.3 Responsibility

9.4 Procedure

10.0 CORRECTIVE ACTION

10.1 Purpose

10.2 Scope

10.3 Responsibility

10.4 Procedure


11.0 CUSTOMER SUPPLIED ITEMS

11.1 Purpose

11.2 Scope

11.3 Responsibility

11.4 Procedure

MARCON CUSTOM METALS INC.	TABLE OF CONTENTS	ISS: 1	REV: 3
Page: 4 of 4	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

12.0 EXHIBITS

12.1 SAMPLE FORMS


MARCON CUSTOM METALS INC.	PREFACE	ISS: 1	REV: 3
Page: 1 of 1	REVIEWED BY: JF	APPROVED BY: [Signature]	DATE: 2005/08/10

PREFACE

This program has been created by Marcon Custom Metals Inc., 698 Wilson Avenue, Kitchener, Ontario, for the purposes described herein.

All copies of this manual remain the property of Marcon Custom Metals Inc. and any reproduction by photographic or electronic means in whole or in part without the express written consent of the owner is strictly prohibited.

The CSA Z299.4 Program shall be implemented for only those contracts requiring the program, as agreed upon by the customer and Marcon Custom Metals Inc.. The Quality Program may be applicable to custom fabrications, miscellaneous fabrications, structural applications or any other as so agreed upon by the customer and Marcon Custom Metals Inc..

MARCON CUSTOM METALS INC.	GENERAL 1.1	ISS: 1	REV: 3
Page: 1 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

1.0 GENERAL

1.1 POLICY AND OBJECTIVES


1.1.1 The President at Marcon Custom Metals Inc., through his appointed Quality Assurance Manager (Q.A.M.) is responsible to ensure that all matters related to quality inspection are in conformance with the policy and procedures of this program.

1.1.2 The Q.A.M. has been granted full authority to direct the Quality Inspection Program. In cases where quality problems are not resolved to the satisfaction of the Q.A.M. they shall be referred to the President.

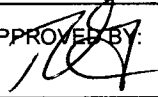
1.1.3 In the case of items manufactured to prevailing codes or standards, the code or standard requirements shall be met. However, contractual requirements or the requirements of CSA Z299.4 which are in addition to or more stringent than code requirements shall prevail, providing they do not violate the pertinent codes or standards e.g. CSA, MCCR, etc.

1.1.4 All personnel working on products subject to the quality assurance requirements of this program shall be thoroughly familiar with the policies, objectives and procedures contained herein.

1.1.5 The objective of the Quality Assurance Program is to ensure a consistent level of product quality is maintained. An ongoing program is to be maintained for the detection and disposition of nonconforming products and/or services.

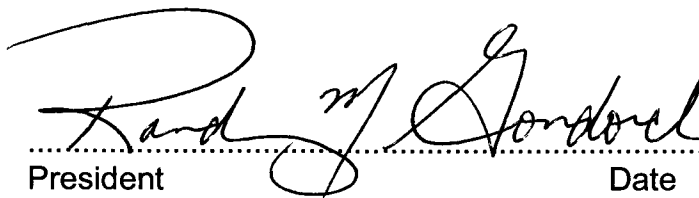
MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 2 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

1.1.6 This Quality Assurance Program is based on the requirements of Canadian Standards Association Standard Z299.4 - 1985.

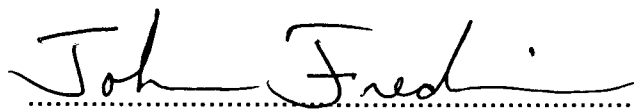
MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 3 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

1.2 STATEMENT OF QUALITY INSPECTION PROGRAM CERTIFICATION


I hereby certify that this Quality Assurance Program has been developed to meet the requirements of CSA Standard Z299.4-1985 for Marcon Custom Metals inc. and reflects the methods in use at Marcon Custom Metals Inc..

 08/08/05

 President Date

 Aug 10/05

 Quality Assurance Manager Date

MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 4 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

1.3 DEFINITIONS

1.3.1 APPROVED VENDORS LIST - A list of Vendors that have been

approved by the Quality Assurance Manager to provide materials or to perform sub-contracting services.

1.3.2 AUDIT - Means a documented activity aimed at verifying by examination

and evaluation that the applicable elements of the Quality Program have been established, documented and effectively implemented in accordance with specified requirements.

1.3.3 BATCH (volume or lot) - Means an identifiable collection of products, or


quantity of material, of a single type, grade, class, size or composition produced in the same facility under essentially the same conditions and at essentially the same time.

1.3.4 CALIBRATION - Means comparing two instruments, measuring devices,

or standards, one of which is of known accuracy. It is done to detect, correlate, report or eliminate by adjustment any variation in accuracy of the instrument or measuring device of unknown accuracy.

1.3.5 CHARACTERISTIC - Means any distinct property or attribute of a

product, process or service that can be described and measured to determine conformance and nonconformance to specified requirements.

MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 5 of 11	REVIEWED BY: J J	APPROVED BY: 	DATE: 2005/08/10

1.3.6 CONTRACT - Means the written covenant and other documents agreed to and legally binding between the customer and supplier which specify requirements and conditions that must be met to successfully complete the work.


1.3.7 CUSTOMER - Means the party or his representative issuing a contract for procuring products or services.

1.3.8 CUSTOMER REPRESENTATIVE - Means the person appointed by the customer to survey and verify the quality of the supplier's work.

1.3.9 DISPOSITION - Means an action to determine how a nonconformance is to be resolved.

1.3.10 EVALUATION - Means an appraisal to determine whether or not production processes and quality assurance programs are capable of producing a quality product or providing a quality service and generating evidence that support decisions of acceptability.

1.3.11 HEAT NO. - Refers to a series of numbers and/or letters stamped, etched or stenciled on steel plate and pipe, which identify that batch of steel as to it's chemical composition and properties, which have been determined and entered on a Mill Test Report, which is certified by the Mill authorities.

MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 6 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10


1.3.12 INSPECTION - Means the examination, measurement, and testing of the characteristics of products or services to determine acceptability and record inspection data.

1.3.13 INSPECTION AND TEST POINT - Means a location or stage in the production cycle where inspection and testing are performed by personnel whose responsibility is to determine the acceptability of products or services and to record inspection and test data.

1.3.14 NONCONFORMANCE - Means a deficiency in characteristic, documentation, or procedure which renders the quality of a product or service unacceptable or indeterminate or not according to specified requirements. Examples of nonconformance are: physical defects, test failures, inadequate documentation, and deviations from prescribed processing or from any part of the program.

1.3.15 OBJECTIVE EVIDENCE - Means any recorded results in measurements, tests or observations which verify the quality of work.

1.3.16 POSITIVE RECALL - Means a method whereby a product can be released so that further work can proceed, provided that the product is identified as being subject to recall and can be removed, repaired or reworked at a later stage if found unacceptable.

MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 7 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

1.3.17 PROCEDURE - Means a document that specifies, as applicable, the purpose and scope of an activity; what shall be done and by whom; when, where, and how it shall be done; what materials, equipment, and documentation shall be used; and how it shall be controlled.

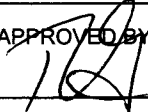
1.3.18 PRODUCTION - Means all activities involved in the fabrication, assembly, construction, and erection of products to specified requirements.

1.3.19 QUALITY - Means the totality of features and characteristics of products or services that bear on their ability to meet specified requirements.

1.3.20 QUALITY ASSURANCE - Means all those planned and systematic actions needed to provide adequate confidence that products or services will satisfy specified requirements.

1.3.21 QUALITY ASSURANCE REPRESENTATIVE (Q.A.R.) - Means the person appointed by the customer to survey and verify the quality of the contractor's work.

1.3.22 REGULATORY AUTHORITY - Means the Federal, Provincial, Territorial, or Municipal agency having the lawful right and power to interpret the law and exercise authority.

MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 8 of 11	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

1.3.23 REPAIR - Means processing nonconforming products so that they can function reliably and safely although the products still do not conform to the original specified requirement.

1.3.24 REWORK - Means reprocessing products to conform to the originally specified requirement.

1.3.25 SERVICE - Means work and incidental material specified in a contract such as inspection, non-destructive examination, calibration, testing, welding and analysis.

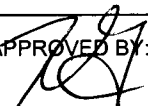
1.3.26 SUPPLIER - Means the party responsible for the performance of the work specified in the contract.

1.3.27 SURVEILLANCE - Means the continuing evaluation, analysis, and verification of a supplier's records, methods, procedures, products, and services, to assure the requirements are met.

MARCON CUSTOM METALS INC.	GENERAL	ISS: 1	REV: 3
Page: 9 of 11	REVIEWED BY: JF	APPROVED BY: [Signature]	DATE: 2005/08/10

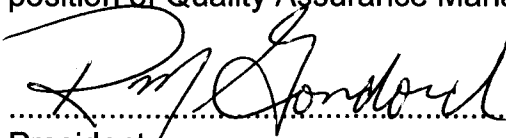
1.3.28 VERIFICATION - Means independently reviewing, inspecting, examining, measuring, testing, checking, witnessing, monitoring, or otherwise establishing and documenting products, processes, services, and documents conform to specified requirements.

1.3.29 WORK - Means any activity performed to provide products and services.

MARCON CUSTOM METALS INC.	SECTION: 1	ISS: 1	REV: 3
Page: 10 of 11	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

1.4 Quality Assurance Manager (Q.A.M.) APPOINTMENT

I hereby appoint JOHN FREDERIKSEN to the position of Quality Assurance Manager at Marcon Custom Metals Inc..

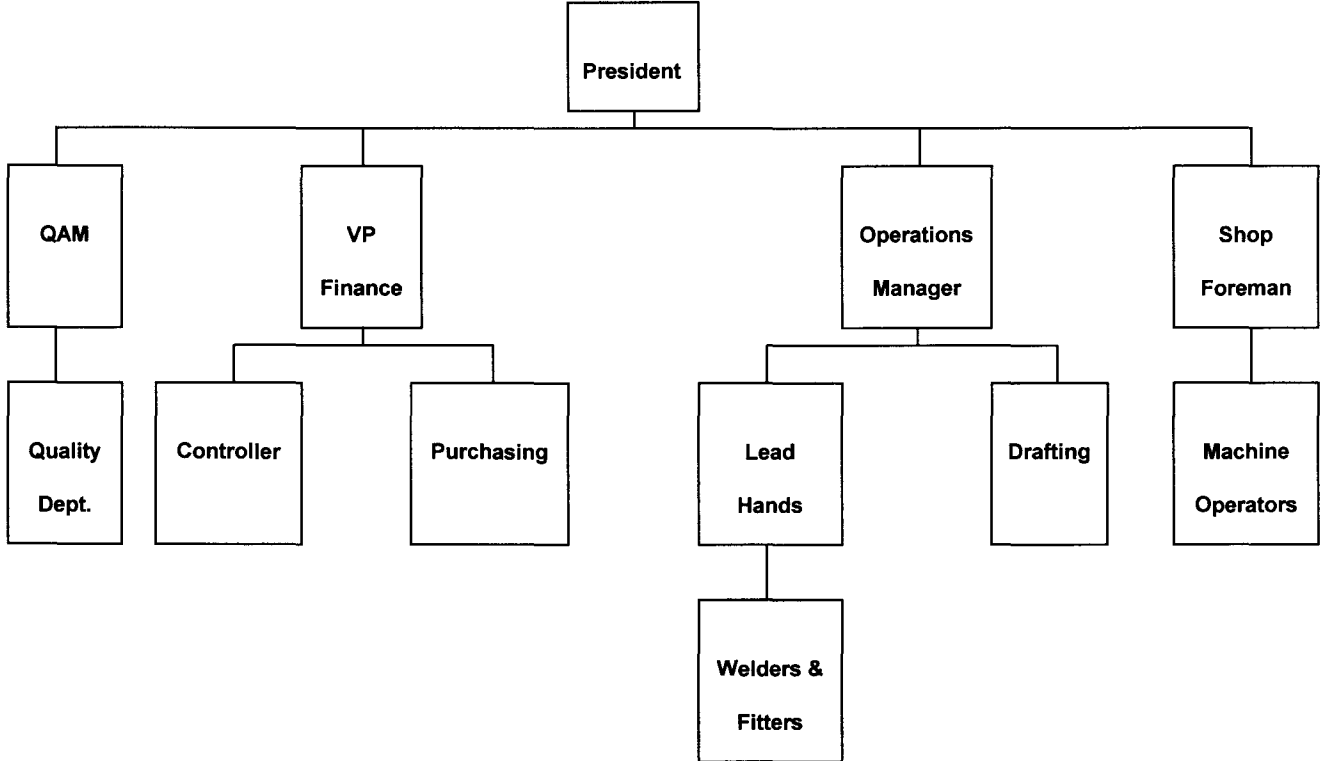
 08/08/05
 President Date


I will, to the best of my ability, ensure that the quality inspection requirements are maintained and adhered to at Marcon Custom Metals Inc. as described in this program.

John Fredrik Aug 10/05
 Quality Assurance Manager Date

MARCON CUSTOM METALS INC.	SECTION: 1	ISS: 1	REV: 3
Page: 11 of 11	REVIEWED BY: JF	APPROVED BY:	DATE: 2005/08/10

1.5 Organizational Chart



MARCON CUSTOM METALS INC.	TENDER AND CONTRACT	ISS: 1	REV: 3
Page: 1 of 3	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

2.0 TENDER AND CONTRACT

2.1 PURPOSE

The purpose of the Contract Review is to ensure that the required policies are followed for tender and contract review and to reference specific procedures and instructions that apply to this subject.

2.2 SCOPE

This section covers the review and evaluation of all tenders prior to bidding and contracts prior to acceptance.

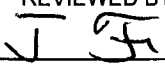

2.3 RESPONSIBILITY

The President is responsible to ensure that the Tender/Contract Review Process has been completed, adequately reflecting the requirements of the following procedure.

2.4 PROCEDURE

2.4.1 All requests for quotation are to be reviewed prior to bidding to determine:

- What is specifically being requested.
- What training and services are required.
- What quality requirements are applicable.
- What manpower or personnel are required to perform the work.
- What materials are involved.

MARCON CUSTOM METALS INC.	TENDER AND CONTRACT	ISS: 1	REV: 3
Page: 2 of 3	REVIEWED BY: 	APPROVED BY: 	DATE: 2005/08/10

- What facilities are required to accomplish the work.
- What lead-time is necessary to perform the work.
- What costs would be incurred by MARCON CUSTOM METALS INC. to accomplish the work.

2.4.2 Following the initial review, all relevant personnel are to review the relevant aspects of the contract applicable to their department and provide any concerns or comments each may have.

2.4.3 A tender is then to be prepared with input from other departments as required.

2.4.4 The Quality Assurance Manager is responsible for evaluating all quality related contract requirements.

2.4.5 Upon receipt of a contract and prior to acceptance, a comparative analysis between the contracts submitted, the original request for quotation and the actual bid submitted by MARCON CUSTOM METALS INC. must be made.

The items to be reviewed and evaluated shall be as follows:

- If differences exist between the original quote and the contract received.
- The exact title and relevant issue of all codes, standards and specifications applicable.
- Which jurisdiction shall participate, where required.
- What are the schedules of any data submissions to the customer or jurisdiction.
- What are the formal lines of contractual communication.

MARCON CUSTOM METALS INC.	TENDER AND CONTRACT	ISS: 1	REV: 3
Page: 3 of 3	REVIEWED BY: JS	APPROVED BY: [Signature]	DATE: 2005/08/10

2.4.6 Any discrepancy or difference to be discovered is to be identified and the customer originating the contract is to be advised in writing.

2.4.7 No contract is to be accepted until such time as all identified discrepancies between the submitted tender and the received contract have been resolved and mutually agreed upon by both Marcon Custom Metals Inc. and the relevant customer.


2.4.8 All customer contracts and related correspondence are to be maintained and an internal order number is to be assigned to each contract for traceability.

2.4.9 For sales orders received by telephone, confirmation as to the accuracy and description of the order is to be accomplished by repeating the order details back to the customer prior to accepting the order.

2.4.10 Contract amendments are to be reviewed, approved and processed in the same manner as the original.

2.4.11 Procurement and control of all materials required to perform awarded contracts is to be conducted.

2.4.12 All contracts and related documentation are to be controlled and maintained in accordance with the QUALITY RECORDS procedure respectively.

MARCON CUSTOM METALS INC.	MEASURING AND TESTING EQUIPMENT	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

3.0 MEASURING AND TESTING EQUIPMENT

3.1 PURPOSE

The purpose of this procedure is to ensure that the measuring and testing equipment in use at Marcon Custom Metals Inc. is maintained within specified limits of accuracy.

3.2 SCOPE

The requirement for calibration and calibration records is not restricted to "precision" equipment, but encompasses all measuring and testing equipment used to verify conformance to specified requirements.

3.3 RESPONSIBILITY

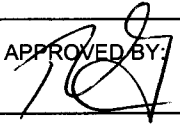
It is the responsibility of the Q.A.M. to ensure that all measuring and test equipment is properly maintained, identified, and calibrated and that all records are complete and on file that verify the status of the equipment.

3.4 PROCEDURE

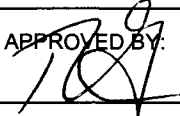
The Quality Assurance Manager shall ensure that:

3.4.1 A complete list is maintained of all measurement and test equipment and all other process equipment subject to calibration.

3.4.2 That all measurement, test and process equipment subject to calibration is assigned a control number which is engraved in or securely affixed to the item.

MARCON CUSTOM METALS INC.	MEASURING AND TESTING EQUIPMENT	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

- 3.4.3** That a calibration schedule for each item is established and that an equipment calibration record is maintained to verify the calibration status of each item. The schedule is based on the amount of use of the instrument, its purpose and its ability to maintain its required calibration.
- 3.4.4** That the calibrations are performed by personnel or agencies qualified to do so, utilizing reference standards whose calibration is certified as being traceable to nationally recognized standards or has been derived from accepted values or natural physical constants. All reference standards used in calibration shall be supported by certificates of accuracy under which the results furnished were obtained.
- 3.4.5** Measurement and Test Equipment which is the property of an employee if used in the quality inspection program, is calibrated and maintained in accordance with this procedure.
- 3.4.6** In the event the accuracy of any measurement, test, or process instrument is in doubt, the item shall be removed from use and calibrated in accordance with this procedure.

MARCON CUSTOM METALS INC.	INSPECTION AND TEST	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

4.0 INSPECTION AND TEST

4.1 PURPOSE

The purpose of this procedure is to ensure that all aspects of inspection and test are performed to the satisfaction of the Q.A.M. and contractual and code requirements are met.

4.2 SCOPE

This procedure applies to all items either purchased or manufactured that are identified on the Inspection and Test Checklist.


4.3 RESPONSIBILITY

The Quality Assurance Manager is responsible for the overall inspection and testing of all products or services, including the responsibility to ensure that all inspection and test requirements are performed satisfactorily and that appropriate records are filed.

4.4 PROCEDURE

4.4.1 Complete all required inspections and tests as required by the Inspection and Test Checklist, with utilization of the Receiving Inspection Report and Final Inspection Report where applicable. The use of these forms is at the discretion of the Quality Assurance Manager.

4.4.2 Record results of Inspections and Tests on the appropriate forms and forward to the Q.A.M.

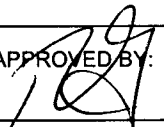
MARCON CUSTOM METALS INC.	INSPECTION AND TEST	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: J J	APPROVED BY: 	DATE: 2005/08/10

4.4.3 Report all nonconforming items.

4.4.4 Prior to release of an item for shipment the Q.A.M. shall review the results of all inspections and tests to ensure conformance with the Inspection and Test Checklist.

4.4.5 A shipping release will be signed by the Q.A.M. when all inspection and test requirements have been met. The signature of the Quality Assurance Manager, acting as a shipping release, may be placed on the shop documentation located with the specific job.

4.4.6 All inspection and test records and other pertinent documents will be filed in the Quality Control job file.

MARCON CUSTOM METALS INC.	INSPECTION AND TEST CHECKLIST	ISS: 1	REV: 3
Page: 1 of 3	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

5.0 THE INSPECTION AND TEST CHECKLIST

5.1 PURPOSE


The purpose of the Inspection and Test Checklist is to ensure that the required analysis and planning of the inspection and test activities has occurred. This analysis and planning results in the contractor producing a document in which he describes when and where in the manufacturing cycle he will inspect and test the characteristics of the item and provide the objective evidence that jurisdictional and contractual specified requirements have been met.

5.2 SCOPE

The checklist shall provide for the inspection and test of purchased items as well as for items which are manufactured or processed in-house. When necessary, inspection instructions shall be provided describing what has to be done to inspect and test the item, equipment to be used, criteria to be met, etc.

5.3 RESPONSIBILITY

The Quality Assurance Manager is responsible to ensure that the Inspection and Test Checklist is sufficiently comprehensive to meet the inspection requirements and that the necessary inspections and tests are performed.

MARCON CUSTOM METALS INC.	INSPECTION AND TEST CHECKLIST	ISS: 1	REV: 3
Page: 2 of 3	REVIEWED BY: J S	APPROVED BY: 	DATE: 2005/08/10

5.4 PROCEDURE

5.4.1 The Q.A.M. in conjunction with other departments shall prepare an inspection and test checklist for each item requiring inspection. The checklist shall:

5.4.1.1 Indicate each inspection and test point and its relative location in the manufacturing cycle.

5.4.1.2 Indicate where sub-contractors services will be employed.


5.4.1.3 Identify the characteristics to be inspected, examined, and tested at each point and specify acceptance criteria.

5.4.1.4 Indicate mandatory hold points established by a jurisdiction or customer which require their witnessing or verification of selected characteristics of an item or process and beyond which the work shall not proceed.

5.4.1.5 Specify the quality inspection standards to be applied to sub-contracted items or services.

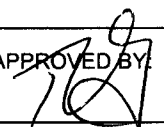
5.4.1.6 Define or refer to how inspection of special processes will be accomplished or documented.

5.4.2 The Inspection and Test Checklist shall be issued to production when the order to manufacture the part is issued. The Operations Manager is responsible to advise the Q.A.M. when inspection, test and mandatory hold points will be reached.

MARCON CUSTOM METALS INC.	INSPECTION AND TEST CHECKLIST	ISS: 1	REV: 3
Page: 3 of 3	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

5.4.3 The Q.A.M. is responsible for advising a jurisdiction or the customer with the required advance notice of an impending mandatory hold point.

5.4.4 The Q.A.M. shall revise the Inspection and Test Checklist as required.

MARCON CUSTOM METALS INC.	IDENTIFICATION	ISS: 1	REV: 3
Page: 1 of 3	REVIEWED BY: J J	APPROVED BY: 	DATE: 2005/08/10

6.0 IDENTIFICATION

6.1 PURPOSE

To define MARCON CUSTOM METALS INC. policy concerning product identification and traceability and to reference specific procedures and instructions that apply to this subject.

6.2 SCOPE

This section covers the activities employed by MARCON CUSTOM METALS INC. regarding the identification of all materials or items produced or procured by MARCON CUSTOM METALS INC. during the manufacturing cycle. This section also covers the activities of MARCON CUSTOM METALS INC. regarding the traceability of materials or items produced or procured during the manufacturing cycle when so required by contract.


6.3 RESPONSIBILITY

The Quality Assurance Manager is responsible for the overall identification program.

6.4 PROCEDURE

6.4.1 The Quality department is responsible for ensuring that all records and documents generated include the relevant part or product identification.

6.4.2 Material and products purchased for incorporation into the end deliverable shall be received, identified, controlled and traceable.

MARCON CUSTOM METALS INC.	IDENTIFICATION	ISS: 1	REV: 3
Page: 2 of 3	REVIEWED BY: J J	APPROVED BY: 	DATE: 2005/08/10

6.4.3 Identification stickers and tags shall be affixed to all incoming items or their containers.

6.4.4 At time of receipt, the packing slip for incoming material and products is to be entered by receiving personnel onto Receiving Inspection Report.


Each product shall be identified by part, lot, component or batch by referencing the applicable drawing, specification, and contract or purchase order.

When traceability of each product is required by contract, the product(s) involved shall be assigned a unique identification number. For the purpose of traceability, this number shall be recorded on all process, inspection and test records.

6.4.5 Completed Receiving Reports are to include:

- the supplier's name
- the Receiving Report number
- the applicable Purchase Order and line number
- the item or part number
- a part description
- the quantity received

6.4.6 Inspection of incoming goods is to then be performed by inspection personnel and physically identified by the inspector. The inspector must then stamp or sign the receiving report to identify that applicable material or parts have been verified.

MARCON CUSTOM METALS INC.	IDENTIFICATION	ISS: 1	REV: 3
Page: 3 of 3	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

6.4.7 Nonconformance detected during inspection are to be processed in accordance with the NONCONFORMANCE procedure.


6.4.8 Acceptable items are to be identified as to their part or reference number and delivered to production or an allocated storage area.

6.4.9 Subsequent to inspection, copies of the completed receiving report are to be issued and the original maintained by the Quality department.

6.4.10 When all work identified within the generated Shop Order has been completed, the items are to be physically identified by an identification sticker or tag and then moved into the shipping area.

6.4.11 The order is to then be packaged and/or palletized as required and shipped to its destination as per contract with all applicable documentation.

6.4.12 All related quality records produced during manufacturing and installation are to be maintained by the Quality department as outlined within the QUALITY RECORDS procedure.

MARCON CUSTOM METALS INC.	SPECIAL PROCESSES	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

7.0 SPECIAL PROCESSES

7.1 PURPOSE

The purpose of this procedure is to ensure that all special processes required for manufacturing and inspection at Marcon Custom Metals Inc. are accomplished under controlled conditions by qualified personnel using qualified documented procedures and equipment.

7.2 SCOPE


This procedure pertains to the following special processes:

7.2.1 Manufacturing Processes

- 7.2.1.1 Welding
- 7.2.1.2 Heat Treating
- 7.2.1.3 Surface Preparation
- 7.2.1.4 Painting

7.2.2 Inspection Processes

- 7.2.2.1 Ultrasonic Inspection
- 7.2.2.2 Magnetic Particle Inspection
- 7.2.2.3 Liquid Penetrant Inspection
- 7.2.2.4 Radiographic Inspection

MARCON CUSTOM METALS INC.	SPECIAL PROCESSES	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10


7.3 RESPONSIBILITY

The Quality Assurance Manager is responsible to ensure that where a process is used in the areas of manufacturing and/or inspection the results of which cannot be directly examined to establish full conformance, written procedures will be provided to assure the work is performed satisfactorily.

7.4 PROCEDURE

The Quality Assurance Manager shall:

- 7.4.1** Ensure that special processes are accomplished under controlled conditions by qualified personnel using qualified documented procedures and equipment in accordance with applicable codes, standards, specifications, criteria and jurisdictional and contractual requirements;
- 7.4.2** Maintain documentation for currently qualified personnel, processes, or equipment according to the requirements of pertinent codes and standards;
- 7.4.3** Define the necessary qualifications of personnel, special processes not covered by existing codes or standards, or where item or service quality requirements exceed the requirements of established codes or standards.
- 7.4.4** Ensure that welding is performed in accordance with the Welding Engineering Standards, Welding Procedure Specifications and Welding Procedure Data Sheets approved by the Canadian Welding Bureau and the applicable requirements of CSA W47.1-03 and W59-03 are met in full.

MARCON CUSTOM METALS INC.	QUALITY RECORDS	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

8.0 QUALITY RECORDS

8.1 PURPOSE

The purpose of this procedure is to ensure that quality records are maintained as evidence that contractual and jurisdictional requirements have been met.

8.2 SCOPE

This procedure pertains to all relevant documents which are used to record inspection and test results otherwise verify that an item conforms to mandatory quality standards, codes, jurisdictional and contractual requirements.


8.3 RESPONSIBILITY

The Quality Assurance Manager is responsible to ensure a complete set of records, as described herein, is maintained on file. The Q.A.M. is responsible for retrieving, providing access or issuing copies of these records to the Q.A.R. and Jurisdictional Authorities as required by Contract or Code.

8.4 PROCEDURE

8.4.1 Records to be maintained on file by the Q.A.M. include, when applicable,

- a. Drawings
- b. Bills of Material
- c. Specifications and Codes
- d. Procedures
- e. Complete Inspection and Test Checklist

MARCON CUSTOM METALS INC.	QUALITY RECORDS	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10


- f. Inspection and Test Reports
- g. Material Certification Reports
- h. Nonconformance Reports
- i. Customer Supplied Items Reports

8.4.2 Inspection and Test Records shall include reference to:

- a. The Drawing Number and Revision or Part Number of the item.
- b. The Work Order or Contract Number.
- c. The date of Inspection or Test.
- d. The identity of Inspector.
- e. The basis of acceptance.
- f. The disposition of nonconforming items.
- g. Evidence of reinspection or retest of repaired or reworked items.
- h. Data recording instruments when specified in the contract.

8.4.4 Inspection and Test Records shall be stored in a secure manner for a minimum of seven (7) years or as specified by the contract.

8.4.5 All quality records shall be available for review and analysis to the customer representative.

MARCON CUSTOM METALS INC.	NONCONFORMANCE	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: JS	APPROVED BY: 	DATE: 2005/08/10

9.0 NONCONFORMANCE

9.1 PURPOSE

The purpose of this procedure is to ensure the prompt identification and segregation of nonconforming items to prevent unauthorized use, and to ensure the correct and timely disposition of these items.

9.2 SCOPE

This procedure refers to materials, parts and assemblies, whether purchased, sub-contracted or manufactured, that are not in conformance with applicable drawings, procedures, codes or other contractual requirements.


9.3 RESPONSIBILITY

It is the responsibility of the Q.A.M. to ensure that all nonconformities are duly recorded and that the disposition of nonconforming items is in accordance with contractual and jurisdictional requirements.

9.4 PROCEDURE

9.4.1 Nonconforming items will be identified, segregated from production, if possible, and held for evaluation. A nonconformance report will be issued to the Q.A.M.


9.4.2 With the concurrence of other responsible parties, the Q.A.M. will prepare a disposition. Repair and use-as-is dispositions require concurrence of all responsible parties and submission for acceptance to the customer as required.

MARCON CUSTOM METALS INC.	NONCONFORMANCE	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: J J	APPROVED BY: 	DATE: 2005/08/10

9.4.3 The Q.A.M. shall ensure that the accepted disposition has been implemented.

9.4.4 The Q.A.M. will provide requirements for reinspection and retesting of repaired and reworked items.

9.4.5 The Q.A.M. will ensure that records are maintained as objective evidence that the repaired and reworked items have been reinspected or retested to original requirements or to the requirements of an approved disposition.

MARCON CUSTOM METALS INC.	CORRECTIVE ACTION	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

10.0 CORRECTIVE ACTION

10.1 PURPOSE

To define MARCON CUSTOM METALS INC. policy concerning corrective action of nonconformance and to reference specific procedures and instructions that apply to this subject.

10.2 SCOPE

This section covers corrective action that shall be taken to resolve nonconformance which have been detected by MARCON CUSTOM METALS INC., its customers, subcontractors or applicable jurisdictions.

10.3 RESPONSIBILITY


The Quality Assurance Manager is responsible for implementing all aspects of the corrective action section of this manual.

10.4 PROCEDURE

10.4.1 The Quality Assurance department is responsible to ensure that the necessary corrective action has been initiated to prevent recurrence of discrepancies and for verifying the effectiveness of the corrective action taken.

10.4.2 Effective corrective action to rectify discrepancies detected shall be developed.

10.4.3 Suppliers are responsible for providing corrective action proposals to resolve detected nonconformance and the implementation of same.


MARCON CUSTOM METALS INC.	CORRECTIVE ACTION	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

10.4.4 MARCON CUSTOM METALS INC. shall promptly investigate and correct nonconformance and conditions adverse to quality when discovered by MARCON CUSTOM METALS INC. or notified of these discrepancies by the customer or an MARCON CUSTOM METALS INC. subcontractor.

10.4.5 Causes of nonconformance shall be investigated by the Quality department and shall include recommended corrective actions to preclude future reoccurrence.

10.4.6 The identification of nonconformance, the cause and corrective action planned and/or taken shall be documented within an NCR.

10.4.7 Follow-up verification of rework or repair shall be performed and documented within the generated NCR as objective evidence that corrective action was taken. Retesting shall also be accomplished and documented where appropriate.

MARCON CUSTOM METALS INC.	CUSTOMER SUPPLIED ITEMS	ISS: 1	REV: 3
Page: 1 of 2	REVIEWED BY: J F	APPROVED BY: 	DATE: 2005/08/10

11.0 CUSTOMER SUPPLIED ITEMS

11.1 PURPOSE

The purpose of this procedure is to ensure that customer supplied items are acceptable, in conformance with the requirements of the contract or other appropriate codes and are maintained in good order.

11.2 SCOPE

This procedure is applicable to all customer supplied materials, parts, tooling and inspection and test equipment.


11.3 RESPONSIBILITY

It is the responsibility of the Q.A.M. to ensure that customer supplied items that are to be embodied into manufactured items are subject to the same inspection and test requirements as other purchased items and that all items are maintained, stored and used in the proper manner.

11.4 PROCEDURE

11.4.1 The Receiving Inspection Report will be utilized for customer supplied items and will be issued to the Q.A.M.

11.4.2 The Q.A.M. will verify the certification, supplied by the customer, that the items supplied are consistent with the quality requirements of the final item.

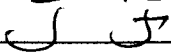

MARCON CUSTOM METALS INC.	CUSTOMER SUPPLIED ITEMS	ISS: 1	REV: 3
Page: 2 of 2	REVIEWED BY: JF	APPROVED BY: 	DATE: 2005/08/10

11.4.3 Promptly examine products, including those involving a service, on receipt for completeness and proper type and to detect transit damage.

Examination may be deferred until further processing is scheduled if items are in sealed containers or have special preservation or packaging.

11.4.4 The Q.A.M. will promptly report in writing to the customer if any items are found damaged, lost, nonconforming or otherwise unsuitable for use either on receipt or while in Marcon Custom Metals Inc. custody.

11.4.5 The Q.A.M. will ensure that items are protected against damage during handling and storage.

MARCON CUSTOM METALS INC.	EXHIBITS	ISS: 1	REV: 3
Page: 1 of 1	REVIEWED BY: 	APPROVED BY: 	DATE: 2005/08/10

12.0 EXHIBITS

Exhibit A: Inspection and Test Checklist

Exhibit B: Certificate of Compliance / Inspection and Test Checklist

Exhibit C: Nonconformance Report

Exhibit D: Receiving Inspection Report

Exhibit E: Final Inspection Report

MARCON CUSTOM METALS INC.
Kitchener, Ontario

Inspection and Test Checklist

Date: _____ Customer: _____

Marcon Job No.: _____ Customer Order / P.O.#: _____

Description: _____

DESCRIPTION	CHECK IF REQ'D	STATUS	DATE	Q.C.	REWORK STATUS	DATE	Q.C.
A: QUALITY VERIFICATION							
1) Incoming Inspection of Materials (Damage; Completeness; Identification)							
2) Welder Qualification per CSA W47.1 or equal							
3) Welding Procedures per CSA W59 or equal							
4)							
B: DIMENSIONAL: IN-PROCESS INSPECTION							
1) Dimensional Check / Fit up / Tacking							
2) Welding / Assembly / Fabrication (Visual)							
3) Surface Prep. For Coating							
4) Application of Protective Coating							
5)							
C: FINAL INSPECTION							
1) Mill Test Certificate / Certificate of Compliance							
2) Packaging and Identification							
3) Final Check							
4)							

D: Release For Shipment

Marcon Inspector: _____ Date: _____

Customer Representative: _____ Date: _____

CERTIFICATE OF COMPLIANCE MARCON CUSTOM METALS INC.

EXHIBIT **B**

PURCHASE ORDER# _____

I HEREBY CERTIFY THAT THE ITEM(S)/COMPONENT(S) DESCRIBED BELOW HAS BEEN MANUFACTURED IN ACCORDANCE WITH PURCHASE ORDER AND SUPPLEMENTARY CONDITIONS, AND HAS BEEN INSPECTED (BY QUALIFIED PERSONNEL) TO VERIFY CONFORMANCE TO THOSE REQUIREMENTS.

LINE	BWC PO#	PART#	DWG#	QUANTITY	DESCRIPTION	DATE REQUIRED

SHIP LOCATION	CONTRACT #	REQUESTOR

TYPE QUANTITY RELEASED _____

**MATERIAL VERIFICATION/
RECEIVING INSPECTION**

MAT'L GRADE

SIGNED: _____
DATE: _____

HEAT NUMBERS: _____
(ATTACH LIST IF APPLICABLE)

CMTR(S) ON FILE	YES	NO	PART CODE
CMTR(S) REQUIRED:	No		

NONCONFORMANCE # (S) _____

JOB # **B** **P** **S**

MATERIAL REQUIRED

SPECIAL NOTES

	MCM	ROUTING	DRS
SHEAR	<input style="width: 30px;" type="text"/>	FLAME	<input style="width: 30px;" type="text"/>
SAW	<input style="width: 30px;" type="text"/>	PLASMA	<input style="width: 30px;" type="text"/>
DRILL/P	<input style="width: 30px;" type="text"/>	BEVEL	<input style="width: 30px;" type="text"/>
BEVEL	<input style="width: 30px;" type="text"/>	ROLL	<input style="width: 30px;" type="text"/>
BRAKE	<input style="width: 30px;" type="text"/>	INSPECT	<input style="width: 30px;" type="text"/>
ROLL	<input style="width: 30px;" type="text"/>	COMPLETE	<input style="width: 30px;" type="text"/>
WELD	<input style="width: 30px;" type="text"/>	REC'D	<input style="width: 30px;" type="text"/>
STRIPPIT	<input style="width: 30px;" type="text"/>		
OTHER	<input style="width: 30px;" type="text"/>		
	<input style="width: 30px;" type="text"/>		

TOTAL SLUG WT
 0

TOTAL WEIGHT
 0

FINAL INSPECTION SIGNED: _____

**ICM QA DEPARTMENT
FINAL APPROVAL SIGNED:** _____ **DATE:** _____

EXHIBIT C

MARCON CUSTOM METALS INC.	NONCONFORMANCE REPORT		DOC: MCM-FRM-022	REV: 0
	REVIEWED BY:		APPROVED BY:	DATE: 98/09/01

NCR No.:	DATE:	DEPT./SUPPLIER:
----------	-------	-----------------

CONTRACT No.:	LOCATION:
---------------	-----------

DRAWING No.:	REV.:	QTY. INSP.:	QTY. REJ.:
--------------	-------	-------------	------------

DESCRIPTION OF NONCONFORMANCE:	SKETCH IF APPLICABLE

INSPECTOR	DATE	Q.A. DIRECTOR	DATE
_____	_____	_____	_____

DISPOSITION:

REWORK
 REPAIR
 SCRAP
 USE-AS-IS
 OTHER

DISPOSITIONED BY	DATE	Q.A. APPROVED BY	DATE
_____	_____	_____	_____

REINSPECTED BY	DATE	INSPECTION STATUS:
_____	_____	<input type="checkbox"/> ACCEPTED <input type="checkbox"/> REJECTED
