


**PROPRIETARY**

All information is believed to be accurate, but no responsibility is assumed for errors or omissions. Interpoint reserves the right to make changes without notice. Copyright © 2001 - 2010 Interpoint Corporation. All rights reserved

**REVISIONS**

LTR	DESCRIPTION	DATE	APPR.
A	INITIAL RELEASE	6/7/94	MEY
B	INC ECO 94-1606-3	MEY	11/1/94
C	INC ECO 96-1689-3	MEY	1/10/97
D	INC ECO 99-0825	RHL	11/1/99
E	INC EO 01-0131	IB	3/16/01
F	INC ECO 01-0258	SS	4/20/01
G	INC ECO 03-0580	SS	5/5/03
H	INC ECO 03-0865	SS	9/17/03
J	INC ECO 04-0024	SS	1/26/04
K	INC ECO 04-0060	SS	1/30/04
L	INC ECO 04-0252	SS	3/10/04
M	INC ECO 04-1085	SS	11/17/04
N	INC ECO 05-0217	SS	2/25/05
P	INC ECO 05-1356	IB	12/12/05
R	INC ECO 08-1412	MH	2-8-08
T	INC ECO 08-2252	LT	01/14/09
U	INC ECO 10-0327	MH	4/27/10
V	INC ECO 10-0475	LT	05/20/10

Technical Services  
 DATABASE: AGILE

UNLESS OTHERWISE SPECIFIED		<b>DR.</b>	MEY CHHANN	7/15/94	 <b>INTERPOINT</b> <small>A CRANE CO. COMPANY</small> 10301 WILLOWS ROAD REDMOND, WA 98052								
		<b>CHK.</b>	D. PFLUGRATH	7/28/94									
ALL DIMENSIONS ARE IN INCHES		<b>ENG.</b>	M. CASPER	7/29/94									
TOL	.XX	±	<b>MFG.</b>	J. DUNLAP		7/15/94							
	.XXX	±	<b>Q.A.</b>	D. PFLUGRATH	7/29/94								
	ANGLE	±	<b>C.M.</b>	M. McNELLEY	7/28/94								
		<b>TECH EDITOR</b>			QUALITY ASSURANCE PROCEDURES MATRIX								
					<table border="1"> <tr> <td><b>SIZE</b></td> <td><b>CAGE NO.</b></td> <td><b>DRAWING NO.</b></td> <td><b>REV</b></td> </tr> <tr> <td><b>A</b></td> <td><b>50821</b></td> <td>QA-093</td> <td>V</td> </tr> </table>	<b>SIZE</b>	<b>CAGE NO.</b>	<b>DRAWING NO.</b>	<b>REV</b>	<b>A</b>	<b>50821</b>	QA-093	V
<b>SIZE</b>	<b>CAGE NO.</b>	<b>DRAWING NO.</b>	<b>REV</b>										
<b>A</b>	<b>50821</b>	QA-093	V										
					<table border="1"> <tr> <td><b>SCALE</b></td> <td><b>SHEET</b></td> <td><b>1</b></td> <td><b>OF</b></td> <td><b>14</b></td> </tr> </table>	<b>SCALE</b>	<b>SHEET</b>	<b>1</b>	<b>OF</b>	<b>14</b>			
<b>SCALE</b>	<b>SHEET</b>	<b>1</b>	<b>OF</b>	<b>14</b>									

## 1.0 PURPOSE

This Quality Assurance Procedures Matrix lists the procedures used to implement the Crane Interpoint's quality program in compliance with AS9100, ISO 9001:2008 and MIL-PRF-38534. The procedures incorporate requirements generally acceptable to all Crane Interpoint customers. The controlled Crane Interpoint Quality Assurance Procedure Matrix is available to team members via Agile per the document distribution procedure. All other copies of the Matrix will be uncontrolled and issued for reference only.

The Quality Assurance Procedure Matrix shall be maintained by the Crane Interpoint Quality Assurance Department, and it shall be reviewed annually for updating the current procedure's list. Specific customer requirements for controls and procedures are not to be included in this document.

## 2.0 SCOPE


The policies of this document shall apply to all departments at Interpoint.

## 3.0 REFERENCE DOCUMENTS

### APPLICABLE DOCUMENTS

The following documents were used to develop this procedure:

ISO 9001:2008	Quality Systems - Quality Management Systems- Requirements
AS9100	Quality Systems - Aerospace Quality Management Systems- Requirements
MIL-PRF-38534	General Specification for Hybrid Microcircuits
QA-040	Quality Manual

 10301 WILLOWS ROAD, REDMOND, WA 98052	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
	<b>SCALE</b>		<b>SHEET</b> 2	<b>OF</b> 18

**4.0 QUALITY MANAGEMENT SYSTEM**

**4.1 General**

QA-040	Quality Manual	Appendix A
QA-039	Generic MIL-PRF-38534 Flow Chart	Appendix A
QA-046	Hybrid Screening Procedure	Appendix A & C
QA-049	Conformance and Periodic Inspections	Appendix A & C
QA-083	General Qualification Test Plan for MIL-PRF-38534	Appendix A & C
QA-093	Quality Assurance Procedures Matrix	
UKQMS-INTRO	Quality Assurance Procedures Manual (UK Office)	
FRQMS-4.1	Quality Assurance Procedures Manual (France Office)	

**4.2 Documentation Requirements**

4.2.1 General

QA-040	Quality Manual	Appendix A
GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-047	Records Retention Matrix	Appendix A

4.2.2 Quality Manual

QA-040	Quality Manual	Appendix A
--------	----------------	------------

4.2.3 Control of Documents


GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-016	Inactivation Procedure	Appendix A
GEN-019	Documents and Engineering Orders Update & Distribution Procedure	Appendix A
GEN-020	Document Control Procedure	Appendix A
GEN-030	Qualified Product Changes	Appendix E
UKQMS-4.5.2.1	Approval and Issue of the Quality Procedures Manual (UK Office)	
UKQMS-4.5.3.1	Changes to the Quality Procedures Manual (UK Office)	
UKQMS-4.5.2.2	Issue and Control of National and International Standards (UK Office)	
FRQMS-4.2.3	Approval, Issue and Changes to the Quality Procedures Manual (France Office)	

4.2.4 Control of Records

GEN-047	Records Retention Matrix	Appendix A
UKQMS-4.16	Control of Quality Records (UK Office)	
FRQMS4.2.4	Control of Quality Records (France Office)	

**4.3 Configuration Management**

GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-016	Inactivation Procedure	Appendix A
GEN-019	Documents and Engineering Orders Update & Distribution Procedure	Appendix A
GEN-020	Document Control Procedure	Appendix A
GEN-030	Qualified Product Changes	Appendix E
GEN-047	Records Retention Matrix	Appendix A

 <p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>SIZE</b> A</p>	<p><b>CAGE NO.</b> 50821</p>	<p><b>DRAWING NO</b> QA-093</p>	<p><b>REV</b> V</p>
	<p><b>SCALE</b></p>		<p><b>SHEET</b> 3 <b>OF</b> 18</p>	

**5.0 MANAGEMENT RESPONSIBILITY**

**5.1 Management Commitment**

QA-040 Quality Manual Appendix A

**5.2 Customer Focus**

ENG-002 Customer Specification Review Appendix A  
 QA-039 Generic MIL-PRF-38534  
 Flow Chart Appendix A  
 QA-046 Hybrid Screening Procedure Appendix A & C  
 QA-049 Conformance and Periodic  
 Inspections Appendix A & C  
 QA-083 General Qualification Test  
 Plan for MIL-PRF-38534 Appendix A & C  
 UKQMS-4.3.2.1 Customer Enquiry Review (UK Office)  
 UKQMS-4.5.2.3 Approval and Issue of Customer Drawings  
 and Specifications (UK Office)  
 FRQMS-5.2 Customer Enquiry Review (France office)  
 FRQMS-7.2.2 Approval and Issue of Customer Drawings  
 and Specifications (France Office)

**5.3 Quality Policy**

QA-017 Quality Audit Procedure Appendix A  
 QA-040 Quality Manual Appendix A

**5.4 Planning**

5.4.1 Quality Objectives

QA-040 Quality Manual Appendix A

5.4.2 Quality Management System Planning

ENG-002 Customer Specification Review Appendix A  
 QA-040 Quality Manual Appendix A  
 QA-039 Generic MIL-PRF-38534  
 Flow Chart Appendix A  
 QA-046 Hybrid Screening Procedure Appendix A & C  
 QA-049 Conformance and Periodic  
 Inspections Appendix A & C  
 QA-083 General Qualification Test  
 Plan for MIL-PRF-38534 Appendix A & C

**5.5 Responsibility Authority and Communication**

5.5.1 Responsibility and Authority


QA-040 Quality Manual Appendix A

5.5.2 Management Representative

QA-040 Quality Manual Appendix A

5.5.3 Internal Communication

QA-040 Quality Manual Appendix A

 <p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>SIZE</b> A</p>	<p><b>CAGE NO.</b> 50821</p>	<p><b>DRAWING NO</b> QA-093</p>	<p><b>REV</b> V</p>
	<p><b>SCALE</b></p>		<p><b>SHEET</b> 4 <b>OF</b> 18</p>	

**5.6 Management Review**

5.6.1 General

GEN-047	Records Retention Matrix	Appendix A
QA-040	Quality Manual	Appendix A
UKQMS-4.1.3	Management Review (UK Office)	
FRQMS-5.6	Management Review (France Office)	

5.6.2 Review Input

QA-017	Quality Audit Procedure	Appendix A
QA-040	Quality Manual	Appendix A
UKQMS-4.17	Internal Quality Audits (UK Office)	
FRQMS-8.2.2	Internal Quality Audits (France Office)	

5.6.3 Review Output

QA-017	Quality Audit Procedure	Appendix A
QA-040	Quality Manual	Appendix A
UKQMS-4.17	Internal Quality Audits (UK Office)	
FRQMS-8.2.2	Internal Quality Audits (France Office)	

**6.0 RESOURCE MANAGEMENT**

**6.1 Provision of Resources**

QA-040	Quality Manual
--------	----------------

**6.2 Human Resources**

6.2.1 General


QA-040	Quality Manual
TNG-001	Training & Certification Manual
UKQMS-4.18.1	Planning and Assessment of Training (UK Office)
UKQMS-4.18.2	Provision of Individual Training (UK Office)
FRQMS-6.2	Planning and Assessment of Training Needs and Provision of Individual training (France Office)

6.2.2 Competence, Awareness and Training

QA-040	Quality Manual	Appendix A
TNG-001	Training & Certification Manual	Appendix A
UKQMS-4.18.1	Planning and Assessment of Training (UK Office)	
UKQMS-4.18.2	Provision of Individual Training (UK Office)	
FRQMS-6.2	Planning and Assessment of Training Needs and Provision of Individual Training (France Office)	

**6.3 Infrastructure**

QA-040	Quality Manual
--------	----------------

 <b>CRANE</b> AEROSPACE & ELECTRONICS <small>INTERPOINT A CRANE CO. COMPANY</small> 10301 WILLOWS ROAD, REDMOND, WA 98052	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
	<b>SCALE</b>		<b>SHEET</b> 5	<b>OF</b> 18

**6.4 Work Environment**

GEN-012	ESD Control Procedure	Appendix A
GEN-018	Cleanliness and Atmosphere Control	Appendix A
GEN-033	Contamination Control	Appendix A
QA-017	Quality Audit Procedure	

**7.0 PRODUCT REALIZATION**

**7.1 Planning of Product Realization**

ENG-001	Design Practices, Guidelines and Limits	Appendix A
ENG-002	Customer Specification Review	Appendix A
ENG-003	Package Design Guidelines	
ENG-005	Engineering Design Checklist	Appendix A
ENG-006	Coil Design Guidelines	
ENG-007	Drafting Schematic Guidelines	
ENG-008	Drafting Guidelines Hybrid Assembly	Appendix A
ENG-009	Drafting Guidelines Hybrid Substrate	Appendix A
ENG-010	Test Integrity Procedure	
ENG-013	Product Development Procedure	Appendix E
ENG-015	Process Validation Procedure	Appendix A
GEN-001	Specification/SCD Generation	
GEN-007	Prototype & First Run Procedure	Appendix A
GEN-024	Traveler Generation Instructions	Appendix A
GEN-035	Requirements for Metal Packages	
GEN-031	Qualified Processes and Materials List	Appendix E
QA-040	Quality Manual	Appendix A
QA-083	General Quality Test Plan for MIL-PRF-38534	Appendix A & C


**7.2 Customer Related Processes**

**7.2.1 Determination of Requirements Related to the Product**

ENG-002	Customer Specification Review	Appendix A
MKT-001	Review & Conversion of Customer Requirements	Appendix A
QA-040	Quality Manual	Appendix A
UKQMS-4.3.2.2	Contract/Order Review (UK Office)	
UKQMS-4.3.3	Amendment to Contract(UK Office)	
UKQMS-4.6.4.2	Customer Verification of Purchased Product (UK Office)	
FRQMS-7.2.1	Contract/Order Review and Amendment and Customer Verification of Purchased Product (France Office)	

**7.2.2 Review of Requirements Related to the Product**

ENG-002	Customer Specification Review	Appendix A
UKQMS-4.5.2.3	Approval and Issue of Customer Drawings and Specifications (UK Office)	
FRQMS-7.2.2	Approval and Issue of Customer Drawings and Specifications (France Office)	

 <b>CRANE</b> AEROSPACE & ELECTRONICS A CRANE CO. COMPANY 10301 WILLOWS ROAD, REDMOND, WA 98052	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
	<b>SCALE</b>		<b>SHEET</b> 6 <b>OF</b> 18	



**CRANE**  
AEROSPACE &  
ELECTRONICS

**INTERPOINT**  
A CRANE CO. COMPANY


10301 WILLOWS ROAD, REDMOND, WA 98052

<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
<b>SCALE</b>		<b>SHEET</b> 7 <b>OF</b>	18

7.2.3 Customer Communication  
QA-040 Quality Manual

**7.3 Design and Development**

7.3.1	Design and Development Planning	ENG-002	Customer Specification Review	Appendix A
		ENG-005	Engineering Design Checklist	Appendix A
		ENG-013	Product Development Procedure	Appendix E
		QA-040	Quality Manual	Appendix A
7.3.2	Design and Development Inputs and Limits	ENG-001	Design Practices, Guidelines	
			Appendix A	
		ENG-003	Package Design Guidelines	
		ENG-006	Coil Design Guidelines	
		ENG-007	Drafting Schematic Guidelines	
		ENG-008	Drafting Guidelines Hybrid	Appendix A
			Assembly	
		ENG-009	Drafting Guidelines Hybrid	Appendix A
			Substrate	
		ENG-010	Test Integrity Procedure	
		ENG-013	Product Development Procedure	Appendix E
		GEN-035	Requirements for Metal Packages	
7.3.3	Design and Development Outputs	ENG-013	Product Development Procedure	Appendix E
		GEN-001	Specification/SCD Generation	
		GEN-002	ECO, DEVIATION, WAIVER	Appendix A
		GEN-019	Document & EO Distribution	
			Procedure	Appendix A
		GEN-020	Document Control Procedure	Appendix A
		GEN-024	Traveler Generation Instructions	Appendix A
7.3.4	Design and Development Review	ENG-013	Product Development Procedure	
7.3.5	Design and Development Verification	ENG-002	Customer Specification Review	Appendix A
		ENG-005	Engineering Design Checklist	Appendix A
		ENG-013	Product Development Procedure	
		GEN-007	Prototype & First Run Procedure	Appendix A
		GEN-031	Qualified Processes and	
			Materials List	Appendix E
7.3.6	Design and Development Validation	ENG-002	Customer Specification Review	Appendix A
		ENG-005	Engineering Design Checklist	Appendix A
		ENG-013	Product Development Procedure	Appendix E
		ENG-015	Process Validation Procedure	Appendix C & E
		GEN-069	New Equipment Validation	
		QA-083	General Quality Test Plan	
			for MIL-PRF-38534	Appendix A & C

 10301 WILLOWS ROAD, REDMOND, WA 98052	INTERPOINT <small>A CRANE CO. COMPANY</small>	SIZE <b>A</b>	CAGE NO. <b>50821</b>	DRAWING NO <b>QA-093</b>	REV <b>V</b>
	SCALE		SHEET <b>8</b> OF <b>18</b>		

7.3.6.1 Documentation of Design and/or Development Verification and Validation

GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-016	Inactivation Procedure	Appendix A
GEN-019	Document & EO Distribution Procedure	Appendix A
GEN-020	Document Control Procedure	Appendix A
GEN-030	Qualified Product Changes	Appendix E
GEN-069	New Equipment Validation	

7.3.6.2 Design and/or Development Verification and Validation

ENG-002	Customer Specification Review	Appendix A
ENG-005	Engineering Design Checklist	Appendix
ENG-013	Product Development Procedure	Appendix E
ENG-015	Process Validation Procedure	Appendix C & E
GEN-069	New Equipment Validation	
QA-040	Quality Manual	Appendix A
QA-083	General Quality Test Plan for MIL-PRF-38534	Appendix A & C

7.3.7 Control of Design and Development Changes

ENG-002	Customer Specification Review	Appendix A
ENG-005	Engineering Design Checklist	Appendix A
ENG-013	Product Development Procedure	Appendix E
GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-030	Qualified Product Changes	Appendix E


**7.4 Purchasing**

7.4.1 Purchasing Processes

MATL-017	Purchasing Procedure	
MATL-011	Outplant Processing	
QA-015	Preventative & Corrective Action Procedure	
QA-040	Quality Manual	Appendix A
QA-053	Supplier Evaluation Process	
UKQMS-4.6.3	Purchasing Data (UK Office)	
FRQMS-7.4.1	Purchasing Data (France Office)	

7.4.2 Purchasing Information

GEN-005	Discrete Semiconductor Dice	Appendix C
GEN-008	Integrated Circuit Dice	Appendix C
GEN-009	General Spec for Transformers / Inductors	Appendix C
GEN-013	Thin Film Passive Elements	Appendix C
GEN-052	Procured Hermetic Devices	
GEN-054	Space Component Screening Requirements	Appendix C
MATL-017	Purchasing Procedure	
MATL-011	Outplant Processing	
QA-015	Preventative & Corrective Action Procedure	
QA-018	Incoming Inspection Procedure	Appendix C
QA-029	Element Evaluation Procedure	Appendix C
QA-053	Supplier Evaluation Process	
QA-096	Tantalum Capacitor Lot Qualification	
QA-098	Control, Screening and Quality Assurance Provisions for Chip	

 10301 WILLOWS ROAD, REDMOND, WA 98052	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
	<b>SCALE</b>		<b>SHEET</b> 9 <b>OF</b> 18	

Style Ceramic Multilayer Capacitors



**CRANE**  
AEROSPACE &  
ELECTRONICS

**INTERPOINT**  
A CRANE CO. COMPANY

10301 WILLOWS ROAD, REDMOND, WA 98052

<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
<b>SCALE</b>		<b>SHEET</b> 10	<b>OF</b> 18

7.4.3 Verification of Purchased Products

MATL-017	Purchasing Procedure	
MATL-011	Outplant Processing	
QA-015	Preventative & Corrective Action Procedure	
QA-018	Incoming Inspection Procedure	Appendix C
QA-020	Package and Cover Incoming Inspection Procedure	Appendix C
QA-021	Inspection of Monolithic and Thin Film Passive Elements	Appendix C
QA-022	Inspection of Discrete Elements	Appendix C
QA-024	Inspection of Passive Elements	Appendix C
QA-029	Element Evaluation Procedure	Appendix C
QA-053	Supplier Evaluation Process	
QA-057	Receiving Test of Passive Elements	
QA-066	Magnetics Inspection	
QA-067	Method 5011 Test Plan	Appendix C
QA-070	Inspection of Bare Ceramic Substrates	
QA-071	Incoming Solder Adhesion Testing of Ceramic Substrates and Thinfilm Materials	
QA-089	Thin film Substrate Inspection	Appendix C
QA-097	Alternate Integrated Circuit Die (ICD) Evaluation Procedure	


**7.5 Production and Service Provisions**


7.5.1 Control of Production and Service Provision

GEN-022	Traveler Issue and Shop Control	Appendix A
GEN-025	Instructions for Using a Traveler	Appendix A
GEN-028	Discrepancy Reporting Procedure	Appendix A
GEN-033	Contamination Control (FOD)	
GEN-061	Routing Procedure	
GEN-068	Use of Work Instructions and Assembly Aids	
MATL-002	Receiving Procedure	
MATL-003	Shipping Procedure	
MATL-004	Work Order Release Procedure	Appendix A
MATL-006	Unplanned Issues Procedure	
MATL-008	Picking and Issuing Kits	Appendix A
MATL-009	Stores Receiving Procedure	
QA-018	Incoming Inspection Procedure	Appendix C
QA-030	Inspection Procedures Manual (FOD)	
QA-040	Quality Manual	Appendix A
QA-088	Medical Line Traceability Procedure	

7.5.1.1 Production Documentation

GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-019	Distribution Procedure	Appendix A
GEN-020	Document Control Procedure	Appendix A

 <p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>SIZE</b> A</p>	<p><b>CAGE NO.</b> 50821</p>	<p><b>DRAWING NO</b> QA-093</p>	<p><b>REV</b> V</p>
	<p><b>SCALE</b></p>		<p><b>SHEET</b> 11 <b>OF</b> 18</p>	

 <p><b>CRANE</b> AEROSPACE &amp; ELECTRONICS</p> <p><b>INTERPOINT</b> <small>A CRANE CO. COMPANY</small></p>	<p><b>SIZE</b> A</p>	<p><b>CAGE NO.</b> 50821</p>	<p><b>DRAWING NO</b> QA-093</p>	<p><b>REV</b> V</p>
<p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>SCALE</b></p>		<p><b>SHEET</b> 12</p>	<p><b>OF</b> 18</p>

7.5.1.2 Control of Production Process Changes

GEN-002	ECO, DEVIATION, WAIVER	Appendix A
GEN-016	Inactivation Procedure	Appendix A
GEN-019	Distribution Procedure	Appendix A
GEN-020	Document Control Procedure	Appendix A
GEN-030	Qualified Product Changes	Appendix E
GEN-047	Records Retention Matrix	Appendix A

7.5.1.3 Control of Production Equipment, Tools and Numeric Control of Machine Programs

QA-040	Quality Manual	Appendix A
QA-050	Metrology System Procedure	

7.5.1.4 Control of Work Transferred, on a Temporary Basis, Outside the Organizations Facilities


MATL-011	Outplant Processing	
----------	---------------------	--

7.5.1.5 Control of Service Operations

GEN-002	ECO, DEVIATION, WAIVER	
GEN-019	Distribution Procedure	
GEN-020	Document Control Procedure	
GEN-047	Records Retention Matrix	
QA-015	Preventative & Corrective Action Procedure	
QA-053	Supplier Evaluation Process	

7.5.2 Validation of Processes for Production and Service Provision

ENG-XXX	Test Equipment Selection	
GEN-025	Instructions for Using a Traveler	Appendix A
GEN-029	General Procedure for Electrical Testing	Appendix C
GEN-032	Rework Guidelines	Appendix E
GEN-037	MISG Operations Procedure	
GEN-047	Records Retention Matrix	Appendix A
MFGX-XXX	All MFG Procedures	
QA-016	Control of Non-conforming Material	Appendix A & C
QA-018	Incoming Inspection Procedure	Appendix C
QA-030	Inspection Procedures Manual	Appendix C
QA-040	Quality Manual	Appendix A
QA-047	Rework and Repair Manual	Appendix E
QA-049	Conformance and Periodic Inspections	Appendix C
QA-050	Metrology System Procedure	
QA-061	Inspection Stamps	

 <p><b>CRANE</b> AEROSPACE &amp; ELECTRONICS</p> <p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>INTERPOINT</b> A CRANE CO. COMPANY</p>	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
		<b>SCALE</b>		<b>SHEET</b> 13	<b>OF</b> 18

7.5.3 Identification and Traceability

GEN-022	Traveler Issue and Shop Control	Appendix A
GEN-025	Instructions for Using a Traveler	Appendix A
GEN-028	Discrepancy Reporting Procedure	Appendix A
GEN-047	Records Retention Matrix	Appendix A
MATL-002	Receiving Procedure	
MATL-003	Shipping Procedure	
MATL-004	Work Order Release Procedure	Appendix A
MATL-006	Unplanned Issues Procedure	
MATL-008	Picking and Issuing Kits	Appendix A
MATL-009	Stores Receiving Procedure	
QA-018	Incoming Inspection Procedure	Appendix C
QA-040	Quality Manual	Appendix A
QA-088	Medical Line Traceability Procedure	
UKQMS-4.8	Product Identification and Traceability (UK Office)	
FRQMS-7.5.3	Product Identification and Traceability (France Office)	

7.5.4 Customer Property


QA-018	Incoming Inspection Procedure	Appendix C
QA-040	Quality Manual	
QA-050	Metrology System Procedure	

7.5.5 Preservation of Product

GEN-012	ESD Control Procedure	Appendix A
GEN-015	Hold Notice Procedure	Appendix A
GEN-018	Cleanliness and Atmosphere Control	Appendix A
GEN-033	Contamination Control	Appendix A
GEN-046	Control of Hazardous Materials and MSDS's	
GEN-068	MSL Moisture Sensitivity Level	
MATL-001	Material Handling and Storage	
QA-074	Handling Limited Life Materials	
UKQMS-4.15.2	Handling (UK Office)	
UKQMS-4.15.3	Storage (UK Office)	
UKQMS-4.15.4	Packaging (UK Office)	
UKQMS-4.15.6	Delivery (UK Office)	
FRQMS-7.5.5	Handling, Storage, Packaging and Delivery (France Office)	

7.6 Control of Monitoring & Measurement Devices

ENG-XXX	Test Equipment Selection
GEN-037	MISG Operations Procedure
QA-050	Metrology System Procedure
UKQMS-4.11	Control of Inspection Measuring and Test Equipment (UK Office)
FRQMS-7.6	Control of Inspection Measuring and Test Equipment (France Office)

 <p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>SIZE</b> A</p>	<p><b>CAGE NO.</b> 50821</p>	<p><b>DRAWING NO</b> QA-093</p>	<p><b>REV</b> V</p>
	<p><b>SCALE</b></p>		<p><b>SHEET</b> 14 <b>OF</b> 18</p>	

**8.0 MEASUREMENT, ANALYSIS AND IMPROVEMENT**

**8.1 General**

GEN-029	General Procedure for Electrical Testing	Appendix A
GEN-032	Rework Guidelines	Appendix E
MFGX-XXX	All MFG Procedures	
MKT-001	Review and Conversion of Customer Requirements	Appendix A
QA-009	Customer Source Inspection Procedure	
QA-030	Inspection Procedures Manual	Appendix C
QA-040	Quality Manual	Appendix A
QA-047	Rework and Repair Manual	Appendix E
QA-060	Statistical Sampling Procedure	
QA-092	Statistical Techniques	

**8.2 Monitoring and Measurement**

8.2.1 Customer Satisfaction



QA-040	Quality Manual	Appendix A
QA-007	Control of Customer Returned Material	Appendix A
QA-008	Failure Analysis Procedure	Appendix A
QA-015	Preventative & Corrective Action Procedure	
UKQMS-4.13.2.2	Review and Disposition on Non-conforming Processed and Returned Goods (UK Office)	
FRQMS-8.2.1	Review and Disposition on Non-conforming Processed and Returned Goods (France Office)	

8.2.2 Internal Audit

QA-017	Quality Audit Procedure	Appendix A
QA-015	Preventative & Corrective Action Procedure	Appendix A
UKQMS-4.17	Internal Quality Audits (UK Office)	
FRQMS-8.2.2	Internal Quality Audits (France Office)	

8.2.3 Monitoring and Measurement Processes

GEN-028	Discrepancy Reporting Procedure	Appendix A
QA-016	Control of Nonconforming Materials	Appendix A


 <b>CRANE</b> AEROSPACE & ELECTRONICS  <b>INTERPOINT</b> A CRANE CO. COMPANY 10301 WILLOWS ROAD, REDMOND, WA 98052	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
	<b>SCALE</b>		<b>SHEET</b> 15	<b>OF</b> 18

8.2.4 Monitoring and Measurement of Product

QA-004	Visual Inspection of Soldering	Appendix C
QA-005	Thick Film Inspection	Appendix C
QA-006	Trimmed Resistor (Thick Film)	Appendix C
QA-012	Transformer / Inductor Pot Core Inspection Procedure	Appendix C
QA-016	Control of Nonconforming Materials	Appendix A
QA-027	Element Assembly Inspection	Appendix C
QA-028	Wire bond Inspection	Appendix C
QA-062	Commercial Product Inspection	
QA-030	Inspection Procedures Manual	Appendix C
GEN-029	General Procedure for Electrical Testing	Appendix C
QA-001	Fine Leak Testing Procedure	Appendix C
QA-002	Gross Leak Testing Procedure	Appendix C
QA-011	Constant Acceleration	Appendix C
QA-013	Lead Integrity Testing	Appendix C
QA-014	Solderability Test Procedure	Appendix C
QA-019	Shipping Inspection	Appendix C
QA-025	External Visual Inspection	Appendix C
QA-026	Physical Dimensions	Appendix C
QA-031	End-of-Line Conformance and Periodic Inspections (Option 2) Only	Appendix C
QA-032	Insulation Resistance	
QA-034	Internal Visual Mechanical Inspection	Appendix C
QA-035	Resistance to Solvents Testing	Appendix C
QA-036	Die Sheer Strength	Appendix C
QA-037	PIND Test Procedure	Appendix C
QA-041	Burn-in Procedure	Appendix C
QA-044	Steady State Life Test	Appendix C
QA-045	Temperature Cycling	Appendix C
QA-046	Hybrid Screening Procedure	Appendix C
QA-049	Conformance and Periodic Inspections	Appendix C
QA-080	In-Line Conformance and Periodic Inspections (Option 1)	Appendix C

8.2.4.1 Inspection Documentation

MFGX-XXX	All MFG Procedures	Appendix A & C
QA-XXX	All QA Procedures	Appendix A & C
UKQMS-4.10.2	Receiving Inspection (UK Office)	
UKQMS-4.10.3	In-Process Inspection (UK Office)	
FRQMS-8.2.4.1	Receiving Inspection and In-Process Inspection (France Office)	

 <b>CRANE</b> AEROSPACE & ELECTRONICS <small>INTERPOINT A CRANE CO. COMPANY</small>	<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
	<b>SCALE</b>		<b>SHEET</b> 16	<b>OF</b> 18

10301 WILLOWS ROAD, REDMOND, WA 98052

8.2.4.2 First Article Inspection

QA-018	Incoming Inspection Procedure	Appendix C
QA-030	Inspection Procedures Manual	Appendix C

**8.3 Control of Nonconforming Product**

General

QA-040	Quality Manual	Appendix A
QA-016	Control of Non-conforming Material	Appendix A
QA-047	Rework and Repair Manual	Appendix C
QA-058	QCI/PDA Lot Disposition	Appendix C
QA-064	Scrap Criteria	
UKQMS-4.13.2.1	Review and Disposition of Non-Conforming Incoming Goods (UK Office)	
FRQMS-8.3	Review and Disposition of Non-Conforming Goods (France Office)	

**8.4 Analysis of Data**

QA-040	Quality Manual	Appendix A
QA-007	Control of Customer Returned Material	Appendix A
QA-008	Failure Analysis Procedure	Appendix A

**8.5 Improvement**

8.5.1 Continual Improvement


QA-040	Quality Manual	Appendix A
QA-017	Quality Audit Procedure	Appendix A

8.5.2 Corrective Action

QA-040	Quality Manual	Appendix A
QA-015	Preventative & Corrective Action Procedure	Appendix A
QA-016	Control of Non-conforming Material	Appendix A
UKQMS-4.14.2	Corrective Action (UK Office)	
FRQMS-8.5.2	Corrective Action (France Office)	

8.5.3 Preventive Action

QA-015	Preventative & Corrective Action Procedure	
QA-065	Low Yield Notice Procedure	
QA-092	Statistical Techniques	
QA-080	In-Line Conformance and Periodic Inspections (Option 1)	Appendix C
UKQMS-4.14.3	Preventive Action (UK Office)	
FRQMS-8.5.3	Preventive Action (France Office)	

 <p>10301 WILLOWS ROAD, REDMOND, WA 98052</p>	<p><b>SIZE</b> A</p>	<p><b>CAGE NO.</b> 50821</p>	<p><b>DRAWING NO</b> QA-093</p>	<p><b>REV</b> V</p>
	<p><b>SCALE</b></p>		<p><b>SHEET</b> 17 <b>OF</b> 18</p>	



**CRANE**

**INTERPOINT**  
A CRANE CO. COMPANY

**AEROSPACE &  
ELECTRONICS**

10301 WILLOWS ROAD, REDMOND, WA 98052

<b>SIZE</b> A	<b>CAGE NO.</b> 50821	<b>DRAWING NO</b> QA-093	<b>REV</b> V
<b>SCALE</b>		<b>SHEET</b> 18	<b>OF</b> 18