



Quality Requirements for Suppliers

Latest Revision – March 8, 2022

SCOPE

The following sections of this document form the requirements for conducting business with Compucraft Industries, Inc.

This document serves as a supplement to existing requirements derived from end deliverable contractors, Primes, i.e. Boeing, Lockheed Martin, Northrop Grumman, Vought, and Goodrich as examples.

Contents

- 1.0 Documentation
- 2.0 Supplier Quality Requirements
- 3.0 Calibration / Testing
- 4.0 Record Retention
- 5.0 Corrective Action
- 6.0 Engineering Data Control
- 7.0 Control of Special Processes
- 8.0 Key Characteristics
- 9.0 First Article Inspection
- 10.0 Compucraft Material
- 11.0 Indication of Inspection Status
- 12.0 Right of Entry
- 13.0 Notifications
- 14.0 Packaging, Crating, and Shipping

1.0 DOCUMENTATION

- 1.1 This section details the supplier's obligations regarding the handling and delivery of required quality assurance documentation.
- 1.2 The supplier shall use the appropriate section of the matrix below to determine the necessary documents to supply with each shipment. Supplier must retain records for a minimum of 10 yrs, unless otherwise specified on the Purchase Order.
- 1.3 There are 6 different opportunities for material purchases Compucraft may require, blue print parts, special hardware i.e. BAC type fasteners, standard parts AN/MS type parts, chemicals, raw material

and outside processing.

1.4 Requirements:

- 1.5 Review the purchase order requirements and determine the appropriate category for the material delivered.
- 1.6 The blocks containing “**Deliver**” indicate that the noted documentation is to be delivered with the hardware. Deliver a copy and retain the original on file.
- 1.7 Blocks containing “**File**” indicate the documentation is to be maintained on file at the supplier’s facility. Retain documentation as required in the Record Retention section.
- 1.8 Documentation requirements specified within engineering specifications or special purchase order requirements shall supersede the requirements of this section.
- 1.9 Raw Material Documentation Requirements
 - 1.9.1 The following documentation must be created and maintained by suppliers delivering Raw materials / hardware. Deliver: Copy of the required documentation with the material / hardware.
 - 1.9.2 All documentation **must** show traceability (chain of custody) from the material producer (mill) to the supplier, to Compucraft.

Raw Material	Supplier	
Document type	Inspection at Compucraft	Drop Shipped
Material Certs.	Deliver	Send to Compucraft
Non Destructive Test	Deliver	Send to Compucraft
Inspect / Accept Report	Deliver	Send to Compucraft
Certification of Conformance	Deliver	Send to Compucraft
Shipping Document	Deliver	Send to Compucraft

1.10 Build to Print Requirements

- 1.10.1 The following documentation must be created and maintained by suppliers delivering “**Build to Print**” hardware. Deliver: Deliver a copy of the required documentation with the hardware.
- 1.10.2 In the event “Build to Print” supplier furnishes material for a Compucraft order, it is the responsibility of the supplier to ensure all documentation shows traceability (chain of custody) from the material producer (mill) to the supplier, to Compucraft.

Build To Print	Supplier	
Document type	Inspection at Compucraft	Drop Shipped
Material Certs	Deliver	Send to Compucraft
Non Destructive Test	Deliver	Send to Compucraft
Inspect Acceptance Report	Deliver	Send to Compucraft
Certificate of Conformance	Deliver	Send to Compucraft
Shipping Document	Deliver	Deliver to supplier shipped to
First Article Inspect Report	Deliver	Send to Compucraft
MRB Issues	Deliver	Send to Compucraft



1.11 Standard Hardware Documentation Requirements

1.11.1 The following documentation must be created and maintained by suppliers delivering “**Standard Hardware**” hardware. Deliver: Deliver a copy of the required documentation with the hardware.

1.11.2 All documentation **must** show traceability (chain of custody) from the material producer (mill) to the supplier, to Compucraft.

Document type	Inspection at Compucraft	Drop Shipped
Material Certs	Deliver	Send to Compucraft
Inspection Acceptance report	Deliver	Send to Compucraft
Certificate of Conformance	Deliver	Send to Compucraft
Shipping Document	Deliver	Send to Compucraft

1.12 Any entry on the supplier's documentation, which requires correction shall be lined through, initialed, and dated by the supplier, leaving the item in a readable condition.

EXAMPLE: ~~This is a correction.~~ JWS 9/5/03

NOTE: If the person deleting the item does not have an entire signature elsewhere on the document, an entire signature is needed. (Use of correction fluid/tape is not acceptable.)

2.0 SUPPLIER QUALITY REQUIREMENTS

2.1 Quality performance assesses the supplier’s ability to meet Compucraft quality and delivery expectations.

2.2 A supplier’s performance is based on the following criteria:

*Quality (Accept vs Reject)

*Delivery

2.3 Compucraft monitors performance internally and does not supply scorecards.

2.4 All suppliers/providers to Compucraft must ensure that all employees realize the importance of product conformity, product safety, and the importance of ethical behavior.

2.5 Suppliers are required to have a QMS system in place that conforms to ISO 9001 at a minimum.

3.0 CALIBRATION / TESTING

Calibration / Testing suppliers must furnish calibration/test reports to the purchase order requirements. All equipment used as a transfer standard must be traceable to the National Institute of Standards and Technology (NIST) in accordance with the requirements contained in ISO 10012, ISO 9001:2000, ISO 17025, NADCAP testing, ANSI Z540, and/or NAVLAP, as applicable.

4.0 RECORD RETENTION

4.1 All documentation (e.g., inspection records, contracts, purchase orders, process and material certifications, test reports, nonconforming material records) for materials supplied to Compucraft shall be retained and are not to be destroyed for a period of ten (10) years from the project completion date on Compucraft’s purchase order, or with written approval from Compucraft’s Quality Department.



5.0 CORRECTIVE ACTION

- 5.1 The supplier will be notified from Compucraft purchasing, of supplier non-conformances on Material Deficiency Report provided. If Corrective Action is required, the supplier will receive a rejection notice with a specific due date for the Corrective Action to be completed by.

6.0 ENGINEERING DATA CONTROL

- 6.1 Materials or parts shall be manufactured/processed to the material or process specification revision in effect at the time the manufacture/process commences. Material or parts may also be inspected to any subsequent revision to which the material or part conforms.
- 6.2 Any specifications or standards referenced or referred to in the documentation provided by Compucraft to Supplier will be provided to the Supplier upon request. Absence of Compucraft not providing reference documents does not absolve Supplier from compliance to said documents. Where Compucraft did not provide reference documents, Supplier shall ensure said reference document are of latest revisions. Any commercially available specifications or industry standards are expected to be seller's sole responsibility.
- 6.3 For Lockheed approved materials and processes ensure compliance to the EPS website requirements. To obtain access to the Lockheed website please follow the instructions noted below. This applies to current approved Lockheed suppliers.
- 1). The person requesting the account MUST be listed as a "contact" for their company in PQN. The Lockheed Buyer accomplishes this. Their email address is what the system matches on to create the accounts. This email address must match EXACTLY what they submit on their account request.
 - 2). The person requesting the account must visit the LM Aeronautics Material Management website and obtain the "request for account" form. The form is found under "Quality Requirements", then "Corrective Action". The form should be filled out, printed, and faxed to the number on the bottom of the form.
- 6.4 For suppliers who are not Lockheed approved, Compucraft must be notified of any necessities or additional information that shall be required to adequately manufacture the part in compliance with Lockheed requirements.
- 6.5 Note: Be aware of the Lockheed specification changes. What is found on the drawing is not always the latest specification to affect the part. Reference Lockheed web-site for specification change history. If password availability is not available please notify Compucraft and the proper documentation will be supplied.

7.0 CONTROL OF SPECIAL PROCESSES

- 7.1 Suppliers may only perform those special processes for which the supplier is listed in the Prime contractor's approval list found in the website for which the parts are ultimately to be used. Use of listed sources does not relieve the supplier's responsibility for the quality of purchased materials and services. Qualification of a Supplier to perform a customer special process (e.g., BAC, DPS, RPS) requires prior customer approval.

8.0 KEY CHARACTERISTICS

- 8.1 In the event a Key Characteristic is flowed down to a supplier. The supplier shall have a system in place that is based on AS9103 to support this requirement.
- 8.2 This requirement will be identified on the Purchase Order to the supplier.
- 8.3 Compucraft will provide the Control Plan that defines all applicable information for the Key Characteristic being monitored.



8.4 The supplier shall provide Compucraft with the applicable control chart as part of their certification package.

9.0 FIRST ARTICLE INSPECTION

9.1 The requirements by which a supplier shall conduct a First Article Inspection (FAI). The supplier shall complete the Detail and Assembly FAI Record (Form No. AS9102) and Detail and Assembly FAI Record Supplement (Form No. AS9102), per the requirements listed herein.

9.2 Supplier F.A.I. forms may be used provided that all the requirements of AS9102 are met.

9.3 All material shall be subject to a FAI at the point of manufacture, whenever one or more of the following conditions occur:

- The first parts are produced
- Engineering change affects the part
- Purchase order change affects the part
- Tool, pattern, or mold is changed, reworked or remade
- Processing techniques are changed
- Manufacturing methods are changed
- Manufacturing location is changed (as required by MQA)
- Previous FAI revealed a nonconformance
- As requested by Compucraft.

9.4 First article inspection shall be performed for all materials consumed within the supplier's deliverable end-item.

9.5 Industry, Government, customer standard parts (e.g., AN, NAS, MS, BAC, S700), supplier standard parts, metallic and non metallic raw materials consumed within an enditem may be accepted based on the original equipment manufacture's certificate of conformance, or FAI documentation.

9.6 The FAI document shall include:

1) 100% of all dimensions, with actual results recorded

NOTE: All features verified using an approved Compucraft inspection tool shall be identified as such, and both the "should be" and "is" shall be recorded. The serial number of the tool shall be noted.

2) All engineering notes

3) All Bill of Material items

4) Any planned deviations from engineering

5) Material certifications or test reports

6) Special process certification test reports

9.7 Parts that can be inspected by conventional means (calipers, height gages, CMM) will be inspected. Those parts or features of parts that cannot be inspected by conventional means will be inspected to tooling that has verification of acceptability to engineering requirements. Those features inspected using tools shall be noted on the FAI, including the tool type and serial number. Tools used to accept product shall be calibrated and traceable to NIST.

NOTE: Compucraft or its customer will maintain Inspection records of Customer supplied tools. If a FAI has already been performed, and one or more of the conditions listed above occurs, the updated FAI report shall consist of at least those characteristics affected by the changes.



9.8 FAI ON PARTIALLY-DIMENSIONED CATIA DRAWINGS

9.8.1 This section details the requirements by which a supplier shall perform FAI on parts defined on partially dimensioned CATIA generated two-dimensional drawings. These requirements are in addition to those listed herein for conventionally dimensioned engineering drawings.

9.8.2 The supplier FAI shall provide evidence of traceability to the dataset provided by Compucraft for those features that are inspected using data found only in the CAD model, e.g., surfaces and non-dimensioned elements. *NOTE: CATIA drawings that have the note "For features not shown see electronic 3-D database", or words to that effect, will be considered "partially dimensioned" CATIA*

10.0 COMPUCRAFT MATERIAL

10.1 The supplier shall maintain traceability of all materials returned to the supplier by Compucraft. Supplier shall rework or replace materials per Compucraft purchase order requirements (no repair or replacement may be performed without prior written authorization from Compucraft). Vendor shall ensure Compucraft supplied material is used solely for the purpose as defined on the Purchase Order. Material may not be moved from vendor location to another location without prior written approval from Compucraft.

10.2 When these materials are returned to Compucraft, accompanying documentation shall meet the minimum requirements of the original purchase order and include a notation on the packing slip that the material is "Returned material from rework or replacement", as applicable.

10.3 If the supplier re-inspection does not verify the reason for rejection or returned material is found to be in conformance with original purchase order requirements, the supplier shall coordinate clarification with Compucraft Quality through Compucraft Purchasing before returning material in question. After clarification has been obtained, the material shall be returned with documentation noting "no work done".

10.4 Compucraft does not accept Counterfeit Material. If suspect materials be sent to Compucraft, it shall be treated as nonconforming material, and further Compucraft shall not be financially responsible for such materials.

11.0 INDICATION OF INSPECTION STATUS

11.1 Material shall be identified per the purchase order. Parts that do not have an adequate feature to attach a tag, or to apply a stamp, shall be individually packaged, unless otherwise directed by specification, with one visible tag per package.

11.2 The part marking, where applicable, will be applied on the tag. The supplier shall not apply an acceptance stamp to the product prior to shipment to Compucraft; final acceptance shall be based on a certification statement on suppliers C of C.

11.3 There is not a requirement on industry standards e.g., AN, MS, NAS etc., unless otherwise mandated by the purchase order or engineering drawing.

12.0 RIGHT OF ENTRY

12.1 Compucraft Industries Inc., Compucraft's customer's, relevant government agency and/or their designated representative reserves the right to conduct surveillance at seller's facility to determine item status, process conformity, and that seller's quality system meets Compucraft quality system requirements.



13.0 NOTIFICATIONS

13.1 Suppliers are required to notify Compucraft in writing of any of the following:

- Non-conforming product
- Changes to Quality System status
- Loss of approvals
- Change of location
- Changes to product / process
- Changes of suppliers used in the manufacturing of Compucraft product

14.0 PACKAGING, CRATING AND SHIPPING

14.1 The packing slip and invoice are the documents required for receipt/payment processing. In order to facilitate processing of the receipt and subsequent payment, the following information must be referenced on every pack slip:

- Suppliers name, address and phone number
- Compucraft purchase order number
- Date parts shipped
- Total quantity shipped and the quantity in each container
- Part number
- Description shown on the purchase order

- Bill of lading
- Legible pack slip number
- Multiple boxes with same pack slip must reference 1 of 3, 2 of 3, 3 of 3, etc.
- Pack slip required on the outside of #1 box and inside each individual box Unit of measure
- Sold to
- Certification data
- Rejection tag number if applicable.