

Spectrum Aerospace Mission Statement:

To provide superior service, added value, and to promote safety and quality throughout the aviation industry worldwide.

About Spectrum Aerospace:

Spectrum Aerospace has been in business since 1986 as an aftermarket supplier of commercial aircraft rotables. Spectrum Aerospace specializes in aircraft parts/material sales, rotatable exchanges, technical purchasing, consignment sales, and inventory management. Spectrum Aerospace has a vast range of customers, from commercial airlines (regional, domestic, and international) to repair stations and other aircraft parts suppliers. Spectrum Aerospace primarily supports the maintenance requirements of commercial aviation, however, it has the capability to meet the needs of other organizations throughout the aviation industry.

Spectrum Aerospace strives for excellence. The company's objective is to provide superior service and to bring value to the customer. The primary goal at Spectrum Aerospace is to deliver quality inspected products expeditiously to customers. In order to accomplish this goal, Spectrum Aerospace must take the necessary steps. First, Spectrum Aerospace must be staffed with personnel who have a vast knowledge of the industry and the aircraft components we provide. Technical research is used for reference in many cases to track and locate components and subassemblies that the customer is in need to fill their requirements. Spectrum Aerospace goes the extra step to bring in and deliver the best possible product to the customer. Spectrum Aerospace delivers their parts with full traceability and/or documentation as required by the customer. Spectrum Aerospace sends out their products repackaged and with new boxes as to assure a safe delivery to the customer.

Spectrum Aerospace provides service to their customers from many dimensions. First, there is purchasing services. Purchasing directly for a customer to help them satisfy their maintenance or AOG requirements. Accuracy, efficiency, and timeliness are very important when purchasing for a customer. Second, Spectrum Aerospace maintains an inventory of aircraft parts/material to immediately respond to aircraft maintenance urgency. Spectrum Aerospace maintains an inventory of serviceable line replacement units, unserviceable units from aircraft dismantles, consignments, and other airline surplus material.

The primary parts/material that are kept in inventory are: Avionics, Hydraulic units, Pneumatic valves, and flight surface rotables.

Spectrum Aerospace has been operating under the ASA-100 Quality Standard since January 1997 and has been an accredited distributor under the provisions of the FAA AC 00-56 since September 1997. Spectrum Aerospace maintains a high commitment to quality to better themselves, their customers and the aviation industry.



Spectrum Aerospace Quality Assurance Manual

1. Quality System and Quality Manual

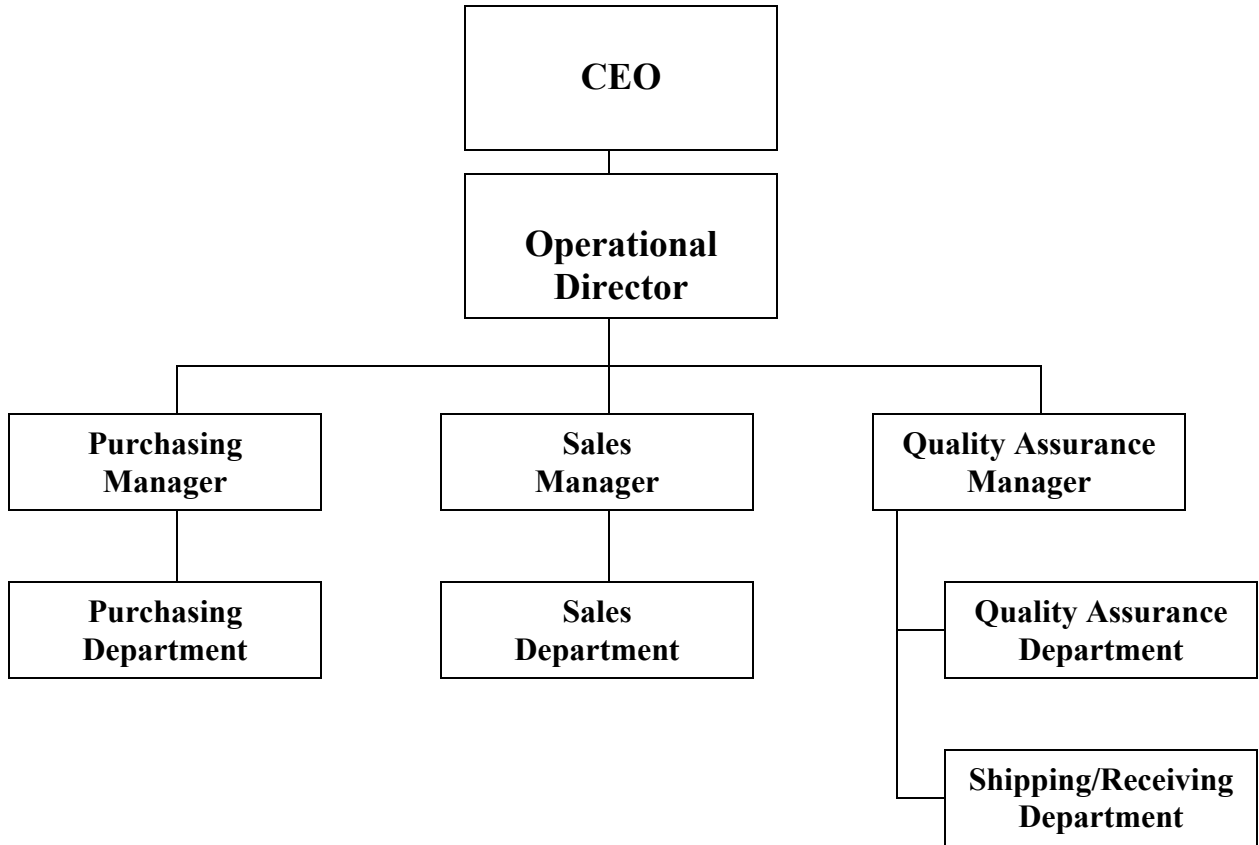
1.1. Quality Assurance System

- 1.1.1. The manager of Quality Assurance is responsible for all functions in the Quality System. The functions include:
- a Assuring customer satisfaction by the following:
 - i All customer requirements have been carried out in an orderly and efficient manner.
 - ii A quality-inspected product has been delivered to the customer.
 - b Maintaining Quality Manual and Revision Control.
 - c Conducting Quality Self-Audit/Evaluations.
 - d Conducting vendor audits/surveys, maintaining and updating approved vendor's list IAW Spectrum Aerospace Vendor Evaluation Program (VEP).
 - e Submitting of Quality Reports on history of vendor performance.
 - f Assuring that all material handling procedures are carried out.
- 1.1.2. The quality manual, which contains company procedures for operations, is available to all Spectrum Aerospace employees and customer auditors or designees.

1.2. Revision Control

- 1.2.1. The Revision Control System assures that all Spectrum Aerospace Quality Assurance Manuals are properly managed, updated, and distributed. The Quality Assurance Manager is responsible for all the functions of the Revision Control System. The Quality Assurance Manager will notify the personnel/organizations that holds a copy of the Quality Manual when a new revision is implemented.
- 1.2.2. A revision record log will be maintained in the Quality Assurance Department for all controlled Quality Assurance Manuals. The record log will demonstrate the following:
- a A distribution list stating the following: manual copy number, manual holder, current revision and date with signatures of Quality Assurance Manual holders.
 - b A revision control cover sheet that states revision number, revision date, insertion date, and initials of Quality Assurance Manager that revision has been completed.
 - c A revision control List of Effective pages (LEP) for each revision.
 - d Replacement instruction for each revision.
- 1.2.3. Any changes to the quality system must be approved by the accreditation/registration organization. A written notification of the acceptance of the change is required prior to the official implementation.
- 1.2.4. Non QA Manual Revision Control. Controlled documentation that is referenced in the Quality Assurance Manual (i.e. ATA-300, applicable SB's & AD's) will be checked bi-annually for current revision status.

1.3. Organizational Chart



2. Self Audit and Accreditation Program

2.1. Self Audit Evaluation

- 2.1.1. Spectrum Aerospace has a self-audit/evaluation program to insure that the quality system is implemented. A self-audit will be conducted every twelve months. The program shall provide the necessary feedback for continuous quality improvement. The self-audit/evaluation is performed in accordance with the checklist of the ASA-100 standard.
- 2.1.2. Audit results are documented, including identifying who conducted the audit, the frequency of the audit, and corrective action of non-compliance: Corrective action shall:
 - a Be appropriate and prompt
 - b Correct the discrepancies reported
 - c Locate and correct similar discrepancies, if they exist, in area not audited,
 - d Correct the root-cause of the problem evidenced by the discrepancies,
 - e Implement follow-up action(s) to assure non-recurrence.

2.2. Self-Audit/Evaluation Procedures.

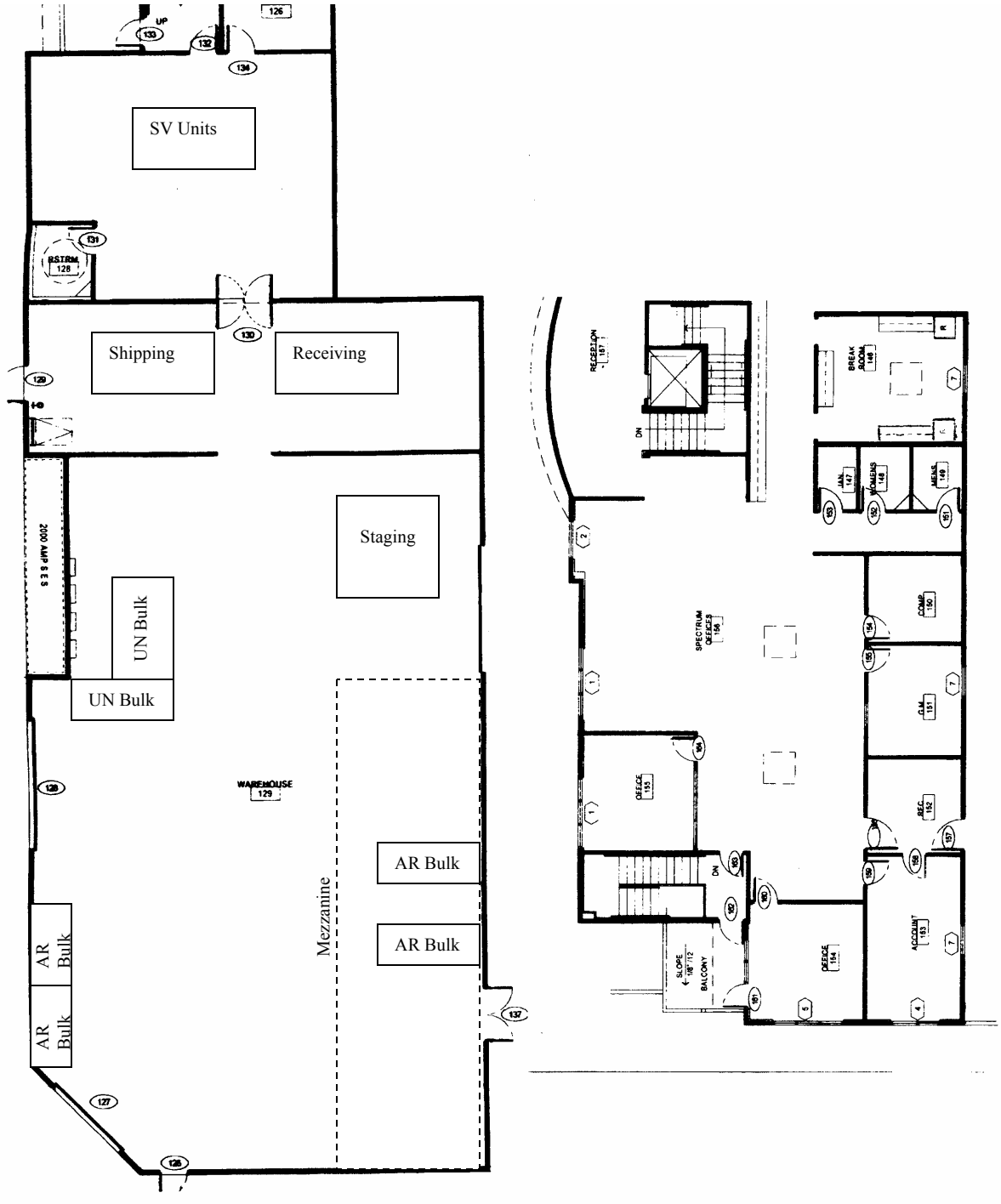
- 2.2.1. The following are procedures that are conducted during the Self-Audit/Evaluation:
 - a Read Quality Manual and ASA-100 Standard as a refresher.
 - b Conduct checklist thoroughly. Reference Quality Manual Page/Paragraph number on checklist to assure 100% compliance to the ASA-100 Standard. Note any discrepancies, concerns, or “work to be accomplished”.
 - c Conduct procurement Integrity Check. This is to assure that parts/material are purchased IAW manual and standard procedures.
 - d Conduct a Facility Walk-Through.
 - e Submit Report.

3. Facilities

3.1. Description of Facility

- 3.1.1. The storage facilities at Spectrum Aerospace are maintained in a secure and clean environment. Aircraft parts/material are very sensitive to rough handling, dust and moisture or electrostatic exposure. Parts/material stored at Spectrum Aerospace will undergo the following:
 - a Each item will be individually wrapped appropriately to prevent dust or moisture contamination.
 - b Each item will have sufficient room on a shelf so that it will not be bumped or mishandled while other parts on the shelf are being inventoried or removed for issue.
 - c Large rotables will be stored in bulk bins and cantilever shelves.
- 3.1.2. Spectrum Aerospace's warehouse/storage area is secured to prevent unauthorized access. Appropriate personnel are staffed in the warehouse during normal working hours. All entry/exit ways to the warehouse all locked when not attended. The facility is equipped with a state-of-the-art security system during closed hours. A lockable fenced area secures the serviceable rotatable storage in the warehouse.
- 3.1.3. All parts/material in the warehouse will be clearly segregated between serviceable and unserviceable units. Appropriate signs, markings, and designations will clearly identify the storage areas. The following inventory system assures parts/material will be stored in appropriate areas:
 - a Serviceable Rotables: R1-R11
 - b Serviceable Bulk: B1A-B1B
 - c Unserviceable Rotables: U1-U9
 - d Mezzanine Unserviceable Rotables: MB6-MB10
 - e Unserviceable Bulk: B2A-B2C
 - f Unserviceable Cantilever: MC1-MC2
- 3.1.4. EXPENDABLE MATERIAL. Spectrum Aerospace does not normally store expendable material; yet these guidelines are set forth in order to properly handle consigned expendables or unique expendable transactions.
 - a New expendables may be stored in the serviceable area in bin boxes.
 - b Used expendables, while normally scrapped, may be part of customer owned material from consignments, and will be stored in the unserviceable area.

3.2. Facilities Layout Map



4. Training Program and Authorized Personnel

4.1. TRAINING PROCEDURES

- 4.1.1. Each employee will have an individual training record.
- 4.1.2. The training records will consist of Quality Manual Training sign off, documentation of formal (classroom) training and on-the-job training (OJT).
- 4.1.3. Each training session will indicate the type of training, method, duration and date of completion.
- 4.1.4. Formal training and OJT will be conducted as necessary to maintain a high awareness to all updates and changes applicable to our business in the aviation industry.

4.2. QUALITY ASSURANCE MANUAL TRAINING.

- 4.2.1. Employees that are involved in the functions of receiving, shipping, quality, or procurement will have their own copy of the Quality Manual.
- 4.2.2. Each employee will require an REVIEW of the Quality Manual every time a revision has been made.
- 4.2.3. It is the responsibility of each employee to make sure that they are staying refreshed on the quality manual procedures.
- 4.2.4. The manager of Quality Assurance is responsible for informing all employees of any revisions to the manual.
- 4.2.5. Each employee will have an initial sign off after they have completed their review of the manual.
- 4.2.6. The sign-off is in each employee's training record.

4.3. INSPECTION QUALIFICATION TRAINING.

- 4.3.1. In order for an employee to become qualified and authorized to conduct inspection procedures, a series of formal and on-the-job training and an exam must be completed. The formal and OJT training will consist of all areas of material handling and in-depth receiving inspection procedures. A score of 94% or higher must be met to successfully pass the inspection qualification exam.

4.4. AUTHORIZED PERSONNEL.

- 4.4.1. Upon successfully passing the exam and completion of the formal training and OJT, the employee is considered authorized as long as they remain in employment status and complete the mandatory Quality Manual training sessions, when required.

4.5. AUTHORIZED ROSTER.

- 4.5.1. A current roster of authorized inspectors is maintained in the Training Program Log. The authorized roster will list authorized inspectors with their signature and initials. Due to the small amount of employees at Spectrum Aerospace, inspection stamps are NOT used. Inspectors will use their initials and/or signature when conducting inspection and material handling reports.

4.6. TRAINING RECORDS KEEPING.

- 4.6.1. All records of training must be kept on file for a minimum of seven years from the time a training session is completed and documented.

5. Procurement

5.1. Documentation Requirements for Purchasing

- 5.1.1. The following are documentation requirements for purchasing parts/material in each stated part condition:
- a NEW (NE)- 8130-3/JAA Form 1 or Certification of Conformance (CofC) and packing list from producer.
 - b NEW SURPLUS (NS)- Material Certification that states identity and condition with documentation to a FAA approved source or airline operator.
 - c OVERHAULED (OH)- 8130-3/JAA Form 1 and Teardown report.
 - d SERVICEABLE (SV)- 8130-3/JAA Form 1 and Teardown report.
 - e OH and SV units without an 8130-3/JAA Form 1 must have the minimum upon receipt:
 - i Maintenance release from a FAA approved source.
 - ii Material certification that states identity and condition of OH or SV unit.
 - iii These units will be immediately sent out to an approved repair station for re-certification, unless the unit is specifically purchased with that documentation for a customer.
 - f REPAIRABLE (RP)- Material Certification that states identity and condition of unit.
 - g AS REMOVED (AR)- Material Certification that states identity and condition of unit.
 - h AS-IS (AS)- No documentation.
 - i This is only used in rare situations when purchasing for non-commercial aviation customers or a customer has waived documentation. (Material Certification Waiver, QA DOC 8)

5.2. Material Certifications and Traceability Requirements

- 5.2.1. In order to better serve customers and improve documentation/traceability in the aviation industry, the following are guidelines of material certification and traceability requirements for the procurement of surplus parts/materials.
- 5.2.2. MATERIAL CERTIFICATION:
- a Parts/material purchased by Spectrum Aerospace must be accompanied with a Parts/Material Certification from the seller. The following list of items are the minimum requirements for a Parts/Material Certification:
 - i Stating Part Number and Serial Number (If Applicable)
 - ii Condition of Unit
 - iii Parts from an aircraft or engine that were subjected to extreme stress or heat are identified as coming from such aircraft or engine. In addition, parts themselves that have been subjected to extreme stress or heat (i.e., a warehouse fire) should so be identified.
 - iv Traceability. Statement of where the parts/material were obtained.
 - b PROCUREMENT FOR STOCK.

Spectrum Aerospace Quality Assurance Manual

- i When purchasing parts/material for stock, the following traceability requirements must be met:
 - 5.2.2.b.i.1. Parts/Material Certification.
 - 5.2.2.b.i.2. Full Traceability. A paper trail leading to the traceability source that is stated on the Parts/Material Certification Form.
- c **PROCUREMENT FOR A CUSTOMER.** When purchasing for a customer, the following traceability requirements must be met:
 - i Parts/Material Certification.
 - ii Traceability per customer request. Any special requirements and traceability requirements for a customer must be met by the source of procurement. The requests must be adequately communicated and stated on the purchase order.
- d **MATERIAL CERTIFICATION WAIVER.**
 - i In certain unique transactions (i.e., purchasing for non-commercial aviation customers) parts/material may be accepted without a Material Certification and Traceability with approval from the customer (See Material Certification Waiver QA DOC 8).

5.3. Vendor Evaluation Program

- 5.3.1. In order to maintain the highest quality standard to our customers, and ourselves, Spectrum Aerospace must evaluate all actively used repair stations and suppliers. A file is maintained for each suppliers and repair station containing questionnaire results and/or approval certificates.
- 5.3.2. AIRLINES
 - a All FAR Part 121 & 129 operators are all automatically approved vendors. However, each source must maintain a sufficient quality history.
- 5.3.3. REPAIR STATIONS
 - a Spectrum Aerospace only uses FAA approved repair stations to overhaul and repair components. In order for a repair station to be added to the approved repair station list, a questionnaire must be filled out meeting appropriate guidelines. The repair station must also provide a copy of their FAA repair station certificate and FAA approved anti-drug and alcohol program. A repair station will remain on the approved list as long as they are maintaining appropriate quality history and their certificate is valid.
- 5.3.4. SUPPLIERS
 - a Suppliers must fill out a questionnaire meeting appropriate guidelines in order to be added to the approved supplier's list. Supplier questionnaires must be filled out annually to remain on the approved supplier's list.
- 5.3.5. FAA AC 00-56/ASA-100 CERTIFIED SUPPLIERS
 - a Suppliers that have met the requirements under FAA AC 00-56 are automatically approved suppliers. They will remain approved as long as they are maintaining appropriate quality history and their certificate is valid.
- 5.3.6. TEMP APPROVED VENDORS
 - a Suppliers and repair stations awaiting questionnaire results will be placed on the approved list on a temporary basis. A vendor will stay temporarily approved for



Spectrum Aerospace Quality Assurance Manual

a maximum of six months. A follow-up questionnaire will be mailed if there is no response after three months. If there is still no response in six months, the vendor will be removed from the approved list.

5.3.7. EVALUATION SUPPLIERS

- a Low usage suppliers will be added to a temporary list for evaluation purposes. Their quality and usage will be monitored for a six-month period. If there is a significant amount of usage among the supplier, they will be sent a supplier questionnaire for consideration to the approved supplier's list.

5.3.8. REMOVAL FROM APPROVED LIST

- a A repair station/supplier that has been removed from the approved list for quality discrepancies may not be reinstated to the approved list until there is a complete overall improvement/redesign to their quality system. A letter from the Director of Quality and/or President of the company must be submitted to the Quality Assurance Manager of Spectrum Aerospace assuring that previous discrepancies will not repeat. Severe discrepancies may require a physical audit for reinstatement to the approved list.

5.3.9. The updated approved suppliers and repair station list is submitted every 30 days.

5.4. Repair Orders

5.4.1. On a regular basis, Spectrum Aerospace has unserviceable rotables that require recertification. These parts/materials are sent to F.A.A. approved repair stations.

5.4.2. REPAIR ORDER PRE-INSPECTION

- a The unserviceable rotables are screened and verified before sent to the repair station. The following must be conducted prior to shipping to repair stations:
 - i Verify part number and serial number match repair order form.
 - ii Verify that correct repair station is on the repair order form and is an approved repair station per the Vendor Evaluation Program (VEP).
 - iii Any specific required work, modification, or action must be initiated on the repair order form.
 - iv Specify that all units must reference the manufactures overhaul manual number on the teardown reports. Status of any applicable A.D. notes must also be confirmed on the teardown reports.

5.4.3. When the unit comes back from the repair station and is in overhauled condition, the following must be verified before being returned to serviceable stock or sent out to a customer.

- a Verify that the part number and serial number on the repair order form match the unit.
- b Verify that the part number and serial number on the 8130-3 and teardown report match the unit.
- c Verify special required work or applicable modifications were completed and documented on the 8130-3 and teardown report.
- d Traceability is accompanied with the unit (as required).

5.4.4. If the unit is returned from a shop uneconomical to repair, the unit is returned to the unserviceable stock area with the cost estimate paperwork attached. This unit may be sent out for repair at a later date.



Spectrum Aerospace Quality Assurance Manual

- 5.4.5. If the unit is returned from a shop "UNREPAIRABLE", the unit is either scrapped immediately or tagged "REJECT" and placed in the quarantine area until it is scrapped.

5.5. Procurement Checklist Procedures

- 5.5.1. Spectrum Aerospace uses a checklist as a procurement system such that materials purchased conform to all documentation and traceability requirements. All personnel involved in purchasing of materials must complete a formal training session on the purchasing requirements and the Procurement/Purchasing checklist. This checklist does not take the place of the (Receiving Inspection Form QADOC1). The QADOC1 form is used only by the authorized individual performing receiving functions that day.
- 5.5.2. The Purchasing/Procurement checklist covers the following criteria:
- a Approved Vendor's List. The procurement source must meet the requirements of the Spectrum Aerospace Vendor Evaluation Program (VEP).
 - b Documentation requirements. The procurement source must meet the documentation requirements for the part(s) condition stated on the purchase order.
 - c Traceability requirements. The procurement source must meet the traceability requirements in accordance with the purchase agreement. The procurement source must also be able to accompany the traceability paperwork with the part/material, if required.
 - d Special requirements must be adequately communicated to the source of procurement. Any deviations must be disclosed and approved by the customer.
 - e Parts from an aircraft or engine that were subjected to extreme stress or heat are identified as coming from such an aircraft or engine. In addition, parts themselves that have been subjected to extreme stress or heat (i.e. a warehouse fire) should be so identified.
 - f All Airworthiness Directives (AD'S) that are represented as having been accomplished are documented. The AD compliance shall specify AD number, AD amendment number, date, and method of compliance.
 - g Items identified as overhauled, repaired, or modified have the appropriate signed and dated documentation attached substantiate the condition of the part.

Spectrum Aerospace Quality Assurance Manual

5.6. Procurement Checklist Form

	<u>YES</u>	<u>NO</u>	<u>N/A</u>
a	Is the procurement source on the Approved Vendor's List?		
	_____	_____	_____
b	Do the parts/materials purchased conform to the specified documentation requirements in accordance with the Spectrum Aerospace Quality Assurance Manual Page # 9?		
	_____	_____	_____
c	Are the parts/materials purchased accompanied with a parts/material certification and traceability as required?		
	_____	_____	_____
d	Are all special requirements adequately communicated to the source of procurement?		
	_____	_____	_____
e	Requested AD status to be documented on 8130-3 or teardown report of the purchased OH/SV unit?		
	_____	_____	_____
f	Are purchased parts that are in OHC or SVC have appropriate signed documentation (i.e. 8130-3, 145 SV tag, Airline SV tag)?		
	_____	_____	_____



6. Receiving Inspection

6.1. **The receiving inspection process consists of verification of correctness of all incoming parts and materials. The process includes an overall inspection of the physical appearance, condition, and the paperwork (documentation and traceability) of the incoming parts and materials.**

6.2. Receiving Inspection Procedures:

- 6.2.1. Inspectors conduct a complete visual inspection of all incoming parts and materials. The receiving inspection procedures consists of the following:
- 6.2.2. Visually inspect the shipping container for signs of damage or rough handling.
- 6.2.3. Carefully remove parts/materials from shipping container (and out of packaging or wrapper) and remove all documentation and other paperwork from box.
- 6.2.4. Verify that the quantity, part numbers or noted part number substitutes (including dash numbers and letters), model numbers, serial number, lot and/or batch number, etc., of the items, match the accompanying documentation and other paperwork.
- 6.2.5. Obtain proper Purchase Order (PO), Repair Order (RO), or Exchange PO paperwork from file (if warranty, see warranty receiving procedures).
- 6.2.6. Verify that the part number or noted part number substitutes (including dash numbers and letters), model numbers, etc., of the parts/materials match the PO/RO/Exchange PO paperwork.
- 6.2.7. Verify that any special requirements or agreements on the PO/RO/Exchange PO have been accomplished (i.e. mod's, A.D./S.B.'s, required work, substitutions).
- 6.2.8. Verify that the documentation and traceability requirements for the parts/material are correct, completed, and signed.
- 6.2.9. Inspect 8130-3 and teardown report (Serviceable units coming back from a repair station (RO) and parts/materials purchased requiring an 8130-3 and teardown report). The following must be completed:
- 6.2.10. 8130-3 and teardown must have
 - a Repair station shop name.
 - b F.A.A. repair station number.
 - c Correct part number and serial number.
 - d Serviceable condition of unit.
 - e Date of Overhaul/Repair
 - f Original signature of authorized shop person.
- 6.2.11. Inspect parts/material for obvious physical damage.
- 6.2.12. Visually inspect parts/material for signs of poor workmanship.
 - a Carefully check caps, plugs, and safety wire for proper installation and correct fit. (Tape shall not be used to cover electrical connections and contaminate hydraulic and fuel units). Bolt holes should be clean and paint should be uniform.
- 6.2.13. Inspect for Unapproved Parts. A suspected unapproved part (SUP) includes a part, component, or material that has not been manufactured in accordance with approved

Spectrum Aerospace Quality Assurance Manual

procedures referenced in FAA Order 8120.10 (latest revision), or has not been repaired/overhauled by an F.A.A. approved repair station. Examples of a SUP includes but is not limited to:

- a Fraudulently marked or counterfeit parts.
- b Parts shipped directly to users by a manufacture, supplier, or distributor, where the parts were not produced under the authority of a production approval for the part (These parts may be a production overrun and may eventually be found to be acceptable).
- c Parts that have been maintained, rebuilt, altered, overhauled, or returned to service by persons or facilities that were not authorized under FAR parts 43 and 145 to perform such services.

6.2.14. Proper notification to the F.A.A. must be done when identifying a SUP. The aviation safety hotline or F.A.A. form 8120-11 may be used.

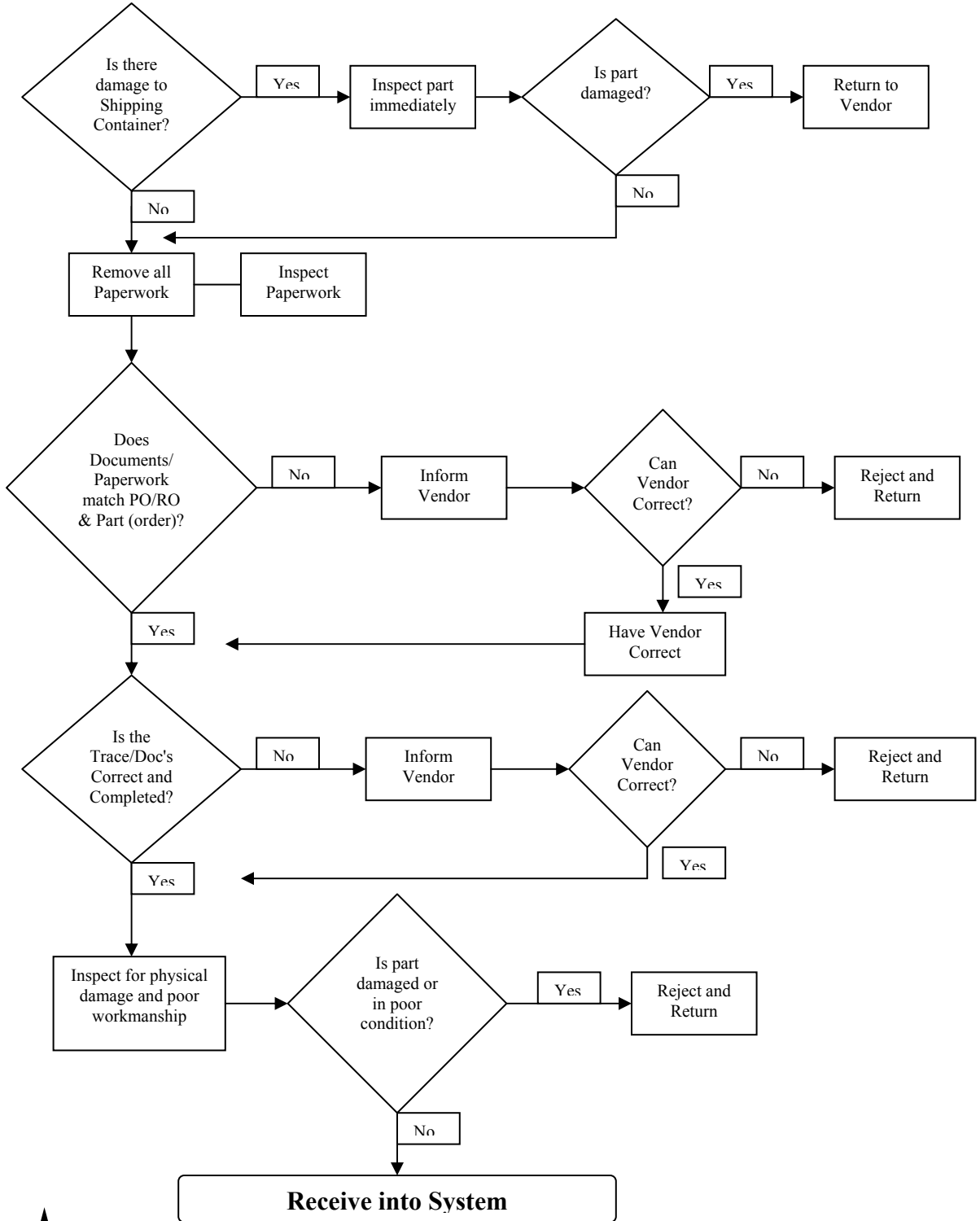
6.2.15. If the inspected parts/material do not meet one or more of the receiving inspection procedures, the parts/materials will be immediately rejected. The parts/materials will be set in the QA Rejected Area until one of the following actions take place:

- a Vendor can immediately correct discrepancy (I.e., paperwork).
- b Parts/material are returned to vendor for correction.
- c Parts/material are returned to vendor due to cancellation of order.
- d Parts/material are sent to quarantine area or scrapped on-site.
- e A Spectrum Aerospace Vendor Discrepancy Report will be submitted if the discrepancy causes a delay in the delivery time to a customer.

6.2.16. All receiving inspection notes and comments will be noted on the receiving inspection form.

6.2.17. Spectrum Aerospace does not use quality inspection stamps. All inspections and release of materials are done by way of signature only. A signature roster is on file included in the roster of quality inspectors located in the Quality Assurance Office.

6.3. Receiving Inspection Flowchart



Spectrum Aerospace Quality Assurance Manual

6.4. Warranty Receiving Procedures

- 6.4.1. The warranty policy for Spectrum Aerospace are as follows:
 - a Six months of date of invoice to customer or longer if,
 - b Repair or Overhaul facility accepts the warranty under a longer policy.
- 6.4.2. The procedures for processing warranty claims are as follows:
 - a Verify part number and serial number to warranty paperwork.
 - b THOROUGHLY INSPECT UNIT FOR ANY SIGNS OF DAMAGE OR MISHANDLING.
 - c Fill-out warranty-receiving report.
 - d Note customer's discrepancies on report and attach copy of discrepancy with unit.
 - e Submit warranty repair order.
- 6.4.3. Warranty Returns. The following are procedures for processing units coming back from the repair station on warranty claims:
 - a Complete warranty report and inspect unit.
 - b Warranty Accepted. If warranty is accepted, the unit will be recertified, processed back into the system, and returned to the customer. The warranty report must be submitted to QA for a discrepancy notation IAW the Vendor Evaluation Program (VEP).
 - c Warranty denied. If unit exceeds warranty policy or is denied by the repair station, the customer will be responsible for the re-certification and freight charges.



7. Measuring and Test Equipment

- 7.1. Spectrum Aerospace does not utilize nor maintain any calibrated measuring or test equipment.**



8. Material Control

8.1. Parts/Material Control and Handling Procedures

8.1.1. SAFE HANDLING AND STORAGE:

- a All parts/material at Spectrum Aerospace will be handled in an appropriate manner and will be protected from the environment, damage and deterioration.
- b The parts/material will be kept in protective plastic wrapping when items are not being inspected or evaluated.
- c All fluid passages, lines, or electrical connections will be capped or plugged.
- d Many aircraft components are very sensitive and can be easily damaged from mishandling. Each component must be treated with extreme caution when being handled.
- e The storage area will be periodically checked for overall effectiveness and to make sure that these items are kept protected and in a safe environment.

8.1.2. PACKAGING:

- a When ever practical, parts/material shall be stored and delivered in the manufacturers original packaging.
- b For new parts/material, packaging shall identify the manufacturer, distributor, part number, serial number, lot or batch number (if applicable), and the quantity.
- c Spectrum Aerospace will use ATA Specification 300 packaging or equivalent, or customer specified packaging when appropriate.
- d Environmentally friendly packaging material should be utilized, when practical.
- e Flammable materials will be packaged in a safe manner per manufacture's recommendations or as specified by local regulations.

8.1.3. PART NUMBERING:

- a The data plate on components will be acceptable when coming from the original manufacture or authorized F.A.A. certificate holder.
- b Parts shall not be labeled with multiple part numbers if such labeling may cause confusion as to the part's manufacture or applicable specification.
- c Alteration to or replacement of the data plate or manufacture's part number is unacceptable, unless authorized by the F.A.A. or F.A.A. certificate holder.
- d Unserviceable components with missing or altered data plates must be properly identified by an authorized F.A.A. certificate holder.

8.1.4. MISC. IDENTIFICATION TAGS.

- a Spectrum Aerospace may use Green "Repairable Tags" to identify unserviceable rotables. The tags will identify Part Number, Serial Number, PO/RO, and Traceability source.
- b Inventory Tags. Certain rotables may be tagged with inventory control tags. The use of these tags is for accounting purposes only.

8.1.5. RECALL CONTROL:

Spectrum Aerospace Quality Assurance Manual

- a The AIRPAX program has the ability to track and maintain records for parts identified by serial number or lot number and the quantities sold to each customer.
- b The system assures that all parts shipped can be traced and recalled, if required.

8.1.6. IMPROPERLY SHIPPED PARTS/MATERIAL:

- a In the event that Spectrum Aerospace has shipped parts/material that do not meet the specific buyer's requirements, and the mistake constitutes a significant event, notification shall be made within 24 hours after discovery to the customer and the accreditation organization.
- b The recipients of mis-shipped parts shall notify the distributor that shipped the part and the local Flight Standards District Office/Manufacturing Inspection District Office.

8.2. ESD Program

- 8.2.1. Spectrum Aerospace handles material that may be subjected to Electro-static discharge (ESD). An anti-static workstation is used to protect such parts/material. Receiving Inspectors will handle ESD sensitive components on the ESD workstation during any inspection or handling process. The Manager of Quality Assurance is responsible for the ESD Program.
- 8.2.2. Serviceable parts/material will be kept in anti-static bags and must be properly capped and plugged when component is not on the ESD workstation.
- 8.2.3. In order to carry out an effective ESD safety program, Spectrum Aerospace must have the ESD workstation tested. The guidelines for testing the ESD workstation are in accordance with the Rockwell Collins standard practices.
- 8.2.4. ESD workstation testing will be conducted bi-monthly by an approved vendor who maintains calibration of the tools required to perform the test. Test results will be recorded and kept on file. Test results that fall below guidelines will result in a reset up of the workstation and a thorough inspection followed by a retest. If the retest fails again, the ESD workstation must be replaced with new mats and wrist-strap.
- 8.2.5. ESD testing is conducted by using a FLUKE 12 digital multi-meter, which is owned and maintained by the vendor.
- 8.2.6. As per the Rockwell Collins standards, the following checks must be completed during each ESD test period by the vendor.
 - a Check #1: Wrist strap and cord. The resistance from the wrist strap metal to the end of wrist strap should be less than 2M ohms.
 - b Check #2: Work surface mat. The resistance across the ground cord terminal and the wrist cord terminal should be less than 1M ohm.
 - c Check #3: Work area. The resistance from the metal on the wrist strap through the wrist strap cord, work surface mat, and ground cord's terminal connector should be less than 10 M ohms.Check #4: Floor mat. The resistance across the ground cord should be from less than 2M ohms.

8.3. Non-Conforming Parts/Material Procedures

- 8.3.1. Any parts/material that does not pass the shipping or receiving inspection will be immediately marked, logged, and segregated from usable stock to a designated area for non-conforming parts/material.
- 8.3.2. The items being held in the designated area for non-conforming parts/material will be tracked and monitored daily for an expeditious return to stock (if corrected), vendor (for correction or cancellation of order), or scrapping procedures.
- 8.3.3. Non-Conforming Parts/Material Report.
 - a A report will be submitted for each part/material that does not pass the shipping or receiving inspection. A vendor discrepancy will be reported if the rejected part/material causes a delay of delivery time to a customer (See Vendor Evaluation Program). The report contains the following items:
 - i Part Number.
 - ii Serial Number.
 - iii Date.
 - iv PO/RO.
 - v Reason for Rejection.
 - b A list of non-conforming parts/material will be updated daily.

8.4. Procedures for Scrapping Parts/Material

- 8.4.1. All scrapped parts/material will be mutilated prior to disposal. Mutilation shall be accomplished in such manner that the parts become unusable for their original intended use. Mutilated parts should not be able to be reworked or camouflaged to provide the appearance of being serviceable.
- 8.4.2. All Spectrum Aerospace Authorized Receiving Inspectors may conduct scrapping of material via notification and approval of the Quality Assurance Manager. The Quality Assurance Manager is responsible for each scrapping procedure and that each part or material scrapped is disposed in the proper manner.
- 8.4.3. Mutilation may be accomplished by, but is not limited to one or more of the following procedures:
 - a Grinding.
 - b Removal of a major lug or other integral parts.
 - c Permanent distortion of parts.
 - d Cutting hole with a torch or saw.
 - e Melting.
 - f Sawing into many pieces.
- 8.4.4. A record of the part number, serial number, date of scrap, reason for scrap for each item being scrapped will be kept on file. The removed data plate (on rotatables) will be kept with the record on file as well. All records of scrapped material shall be kept on file for a minimum of seven years.
- 8.4.5. OFF-SITE SCRAP. Any item that is scrapped off-site (i.e. subcontractors or repair facilities) will be required to conduct the procedures at the same standard or higher as

Spectrum Aerospace Quality Assurance Manual

Spectrum Aerospace. The record of items being scrapped must be submitted to Spectrum Aerospace once the procedure is carried out.

8.5. Material Misrepresentation

- 8.5.1. In the event Spectrum Aerospace ships parts/material that are materially misrepresented to the customer, Spectrum Aerospace shall notify the customer, unless the customer is already aware of the problem. Spectrum Aerospace shall also notify the accreditation organization. Notification shall be made in writing within 24 hours after discovery.
- 8.5.2. In the event that Spectrum Aerospace receives parts/material and discovers that they are materially misrepresented, Spectrum Aerospace shall notify the source from which the parts/material was received, unless the source is already aware of the problem. Notification shall be made in writing within 24 hours after discovery.

8.6. Suspected Unapproved Parts

- 8.6.1. Spectrum Aerospace will report suspected unapproved parts to the FAA according to the provisions of AC 21-29.



9. Shelf Life Control

9.1. **Spectrum Aerospace has adopted an internal shelf life program for their rotatable components. This program is to ensure that the serviceable storage area is stocked with current certified parts/material only. The Manager of Quality Assurance is responsible for maintaining the Shelf-Life Program.**

9.1.1. The shelf life policy goes as follows:

- a Avionics- 3 Years
- b Hydraulics- 3 Years
- c Evacuation Slides- 3 Years
- d Sheet Metal (Flight Surfaces, Cowlings, etc)- No Limit

9.1.2. Components that exceed the shelf life time will be removed from the serviceable shelves. Once removed, they will be placed on the unserviceable shelves in a designated area for units with expired tags.

9.1.3. A report will be submitted and reviewed every six months to identify any expired components. Once the report is reviewed and the expired components are removed from the serviceable locations, the report will be filed accordingly.

9.1.4. Components in the shelf life shelves that are sold are considered to be in the same condition prior to transfer (i.e. OH or SV). Recommendation for re-certification to the customer may be appropriate. The customer, however, will make the final decision to whether re-certify the component or keep the present certification.

9.1.5. Shelf Life Report Procedures.

- a Print a Shelf Life (AIRPAX) computer report (Rough Draft, working copy).
- b Review list and highlight items that are not in the Shelf Life designated areas (R9A-R9D).
- c Physically inspect every highlighted item. Relocate each item that has an expired tag per the Shelf Life Policy. Cross out old locations on working form and write in the new location of the expired unit. If unit does not have an expired tag or is not an applicable unit to the program, mark appropriately on working form.
- d Note new location on AIRPAX report.
- e Submit a final draft report Printout from AIRPAX and make appropriate marks on items that are not in the Shelf Life designated areas.
- f Submit and file Complete Shelf Life Report: Cover Page, list of items relocated, Shelf Life inventory list, and smooth AIRPAX Printout report.
- g Sign-off on check sheet.

10. Certifications and Release of Materials

- 10.1. **Spectrum Aerospace provides customers with a certification contained with the following statement: “I hereby certify that Spectrum Aerospace, Inc. is an accredited distributor under the provisions of the AC 00-56, and the original of the applicable certification is on file at this place of business.”**
- 10.2. **Additionally, a certified statement disclosing the following may be issued about the material of parts, certifying that they were or were not:**
 - 10.2.1. Removed from an aircraft or engine that was not subjected to extreme stress or heat.
 - 10.2.2. Themselves subjected to extreme stress or heat (i.e., a warehouse fire).
 - 10.2.3. Obtained from the U.S. Government or military services.
 - 10.2.4. The traceability source will be stated on the certification form. Full traceability paperwork will accompany the part/material if required by the customer.
- 10.3. **Spectrum Aerospace will provide a document from a FAA approved repair station or air carrier for each serviceable part indicating that the part is serviceable (not applicable to new parts unless work or test was performed on the part). The document must contain a maintenance release statement for return to service signed by an authorized individual of the repair station. The maintenance release must be signed. Inspection stamps, or symbols, or printed/stamped names are not acceptable. A copy of the teardown report that describes the condition found at overhaul and list of significant parts replaced will be included.**
- 10.4. **Spectrum Aerospace will maintain copies of all documentation that certifies the maintenance of materials. In addition, copies of part certification to the source of production or FAA certificate holder will be kept on file.**
- 10.5. **AS-IS. Parts/materials in as-is condition may be released without any certification.**
- 10.6. **Material Certification Waiver.**
 - 10.6.1. Parts/material obtained by Spectrum Aerospace without traceability or a parts/material certification may be released to a customer via approval of the condition. A Material Certification Waiver will be submitted and filed stating that customer is aware of the circumstances applicable to the parts/material.

11. Shipping

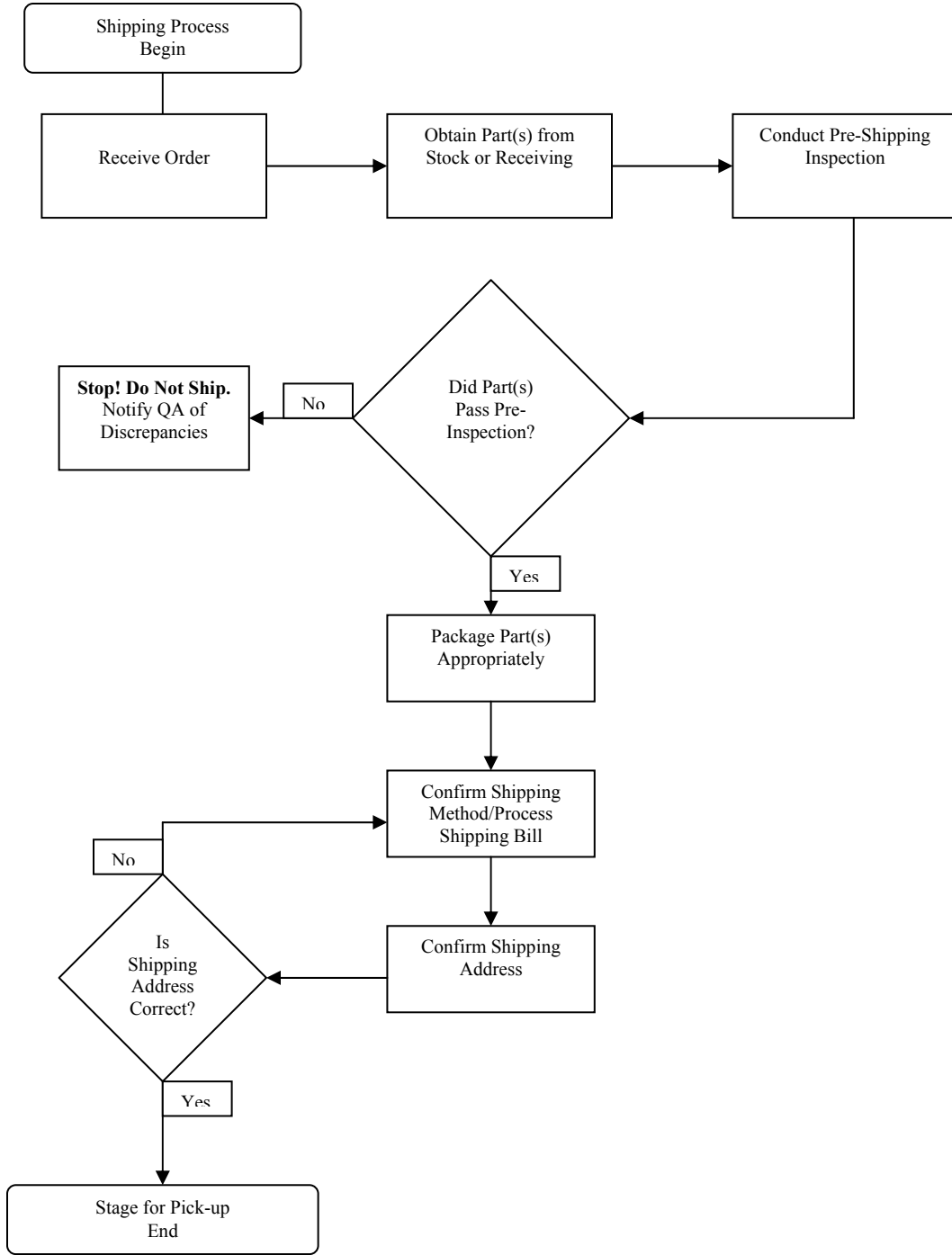
11.1. Spectrum Aerospace requires parts/materials to be shipped in an ATA-300 specification container or equivalent as appropriate for the unit being shipped, or as specified by the customer. The item(s) will be packed in a manner that will prevent damage from the rough handling of the container.

11.1.1. Pre-shipping Inspection: Spectrum Aerospace will have appropriately trained personnel conduct a complete visual inspection of all items being shipped. The inspection will include, but is not limited to:

- a A check of any obvious physical damage.
- b Verifying that all appropriate plugs and caps are installed (Tape shall not be used to cover electrical connections or fluid fittings/openings. Adhesive residue can insulate electrical connection and contaminate hydraulic or fuel units.)
- c Verifying that part numbers (including dash numbers and letters), model numbers, serial numbers, ect. of the items being shipped matched the accompanying documentation.
- d Verifying that part numbers (including dash numbers and letters), model numbers, serial numbers, ect. of the items being shipped match the customer's request/purchase order.
- e Verifying that packing slips contain all the information required by the customer.
- f Verifying that the shipping container and packing are appropriate for the items being shipped.
- g Verifying that all appropriate required documentation (maintenance release, material certification, traceability documents, ect.) are at hand, properly completed, and signed.

11.1.2. Shipping Control/Packaging: After the completion of the shipping inspection, the parts/materials being shipped must be properly packaged as appropriately for that specific unit. All units should stay in their protective plastic wrap (if applicable) with adequate room inside the container to prevent damage. All units will be shipped in their assigned containers or a new fiberboard box packed by using the insta-pack foam machine.

11.2. Shipping Flow Chart



12. Records

- 12.1. **Spectrum Aerospace maintains all documentation of traceability for at least 7 years from the date of sale to the customer. All documentation demonstrates serial number, or lot and batch number traceability, when applicable. All hard copy documents are properly filed by customer sequence. The documents are readily available and identifiable for each customer and purchase.**
- 12.2. **The records are maintained in the files are indoor and protected from damage. All records are secured from alteration, deterioration, and loss.**

13. Technical Data Control

- 13.1. **Spectrum Aerospace does not have any controlled technical data.**
- 13.2. **All IPC's and maintenance manuals are used for reference only for identification purposes. They are clearly marked "NOT CURERENT"/"FOR REFERENCE ONLY".**

