SUPPLIER EXCELLENCE MANUAL

AEROSPACE GROUP ADDENDUM

September 2025 Revision

Requirements outlined on this document are in addition or provide clarification to the Eaton's Global Supplier Excellence Manual (SEM) which pertain to those suppliers selling to the Aerospace Division.

Title:
Date:
Signature:

Contents

1   Scope

This document is supplemental to the requirements already defined in the Eaton Global Supplier Excellence Manual (SEM). The intent of this document is to define for all external Tier1 direct material and service suppliers the minimum requirements, processes, and systems for doing business with Eaton Aerospace Group, as well as align to Eaton Aerospace's Customer Specific Requirements.

Note that each section in the Eaton Supplier Excellence Manual (SEM) has a corresponding section in this addendum document. In many cases there are no additional Aerospace Group specific requirements so these are marked 'No additional requirements'.

2   Reference Material (No additional requirements)

3   Terms & Definitions

Term	Definition
Flight Hardware	Generally, flight hardware refers to any component(s) or equipment that is intended for flight. If unsure whether an item is considered "flight hardware", the supplier should contact Eaton for guidance.

4   Expectations of the Supplier

4.1   Quality Management System Requirements

All Tier 1 Suppliers and Sub Tier Special Process Suppliers shall obtain approval as an Eaton Aerospace supplier and be listed on the Aerospace Approved Supplier List in order to perform work on behalf of Eaton Aerospace.

Suppliers may request that a Sub-Tier supplier be added to the Aerospace Group's External ASL through their Supply Chain contact in the Eaton business. Such sources shall not be used prior to receipt of documented approval from Eaton Aerospace Group Quality. Use of suppliers listed on Eaton's external special process supplier ASL shall adhere to the approval scope and restrictions listed on the External ASL. Suppliers are responsible for monitoring the certification and approval status of special process suppliers including lapse or revocation of certifications.

The Quality Management System requirements for Suppliers of direct material, Sub-Tier special process suppliers and specific indirect services are defined below:

Product / Service Type	Minimum QMS Requirements
Manufacture of flight hardware	AS/EN/JISQ9100

Special Processes
   • Welding, Chemical Process, Heat Treat, Non-Conventional Machining, Surface Enhancement, Materials Testing, NDT
   • Coatings (CT)
	NADCAP certification for the associated process and scope (AC7004, if not AS9100)
	Note: as per NADCAP requirements, these suppliers must also have a certified Quality Management System.
	Exception: Non-flight hardware. Only QMS to ISO 9001 as a minimum is required.

Manufacture of non-flight hardware • (example: Ground Fuel)	ISO9001 or IATF16949
Raw Material	ISO9001 or as required by material specification
Distributors	AS/EN/JISQ9120
Calibration Services for inspection, test and applicable manufacturing equipment	ISO17025 or equivalent laboratory accreditation (example: A2LA)

Suppliers may maintain evidence of certification through the IAQG OASIS or NADCAP eaudit.net databases and provide access to Eaton to witness the relevant data within OASIS and NADCAP database when applicable. Suppliers must demonstrate compliance with all industry standards specified in Eaton Purchase Orders. Additionally, personnel involved in these processes must be certified and/or adequately trained to perform their respective roles. All other Suppliers shall upload evidence of Quality Management certification in WISPER.

Suppliers shall ensure all Aerospace Specialty metals are DFARS-complaint, with traceable sourcing from approved origins as per US defense regulations.

A Supplier not meeting the above quality system requirements may be audited at any time for reasons not limited to performance and may be liable for the actual costs of such audits, at Eaton's option. Evidence of Eaton approval for continued business shall be in place.

Suppliers shall ensure that their employees are aware of:

- Their contribution to product or service conformity
- Their contribution to product safety
- The importance of ethical behavior

5 Planning (No additional requirements)

6 Support

6.3 Document Control & Retention

In addition to Section 6.3, Suppliers shall:
- Retain manufacturing and quality records for a minimum of 10 years from the date of manufacture.
- Retain manufacturing quality records for flight safety and critical components for 40 years from the date of manufacture.
- After retention period has expired, quality records shall be disposed in accordance with Supplier's quality management system requirements.

7   Operation

Counterfeit Parts Prevention

Suppliers shall implement processes appropriate for their organization for the prevention of counterfeit or suspect counterfeit part use and comply with Eaton Aerospace Policy SD-013 found in the Reference Material section of this manual to prevent the infiltration of counterfeit or questionable pedigree components into Eaton products.

7.3   Product Realization

Suppliers shall implement product realization systems/tools production and service provision under controlled conditions.

7.3.2   Process Failure Modes and Effects Analysis (PFMEA)

In addition to Section of 7.3.2, for Aerospace components, the PFMEA shall:

- Be in accordance with AS13004 Process Failure Mode and Effects Analysis (PFMEA) and Control Plans
- Identify Special Characteristics.
- Identify failure modes with High RPNs, High Severity, Critical to Customer, Critical to Quality, Customer Interface Features, and Special processes.
- Include recommended actions for higher RPN line items, where RPNs have been analysed using ParetoTop 10, "RPN greater than X" (RPN threshold ' X' is defined at a plant level based on capacity and resource).
- Be maintained as a live document and updated following changes to design or manufacturing processes, or in the event of a non-conformance requiring corrective action.

A single PFMEA may be applied to a group or family of components that are produced by the same manufacturing process. Alternatively, suppliers can choose to maintain PFMEAs for individual operations and reference these as appropriate within the part or part family PFMEA.

7.3.3   Control Plan

In addition to Section 7.3.3, for Aerospace components, Control Plans shall:

- Be in accordance with AS13004 Process Failure Mode and Effects Analysis (PFMEA) and Control Plans.
- Identify the required controls for all High RPN, High Severity, Critical to Customer, Critical to Quality, Customer Interface Features, and Special processes.

A single Control Plan may apply to a group or family of components that are produced by the same manufacturing process. The group or family of parts to be addressed by a single Control Plan shall be submitted to Eaton for approval.

7.3.5   Process Capability

Process Capability data is a requirement for Key Characteristics as defined by the Eaton drawing(s) and contracts; in addition to Section 7.3.5, for Aerospace components, Suppliers shall:

- Implement a process in accordance with AS9103 Variation Management for Key Characteristics.
    - Note: For initial Process Capability Studies for Eaton Aerospace Suppliers, a capable process shall strive for Cpk≥1.33, as opposed to what is stated earlier in the Global Supplier Excellence Manual
- Maintain records of Process Capability data including ongoing Cp and Cpk analyses for key characteristics.
- Provide Process Capability data with each shipment upon request from the Eaton business.

7.3.6 Inspection

Source Inspection
When requested by Eaton Aerospace, Suppliers shall support Source Inspection activities by Eaton, its Customers, or Government representatives. Suppliers shall contact the appropriate party for scheduling of source inspection prior to completion of the product in such cases. Product shall not be shipped until source inspection has been completed including appropriate documentation.

First Article Inspection
First Article Inspection (FAI) is required upon initial shipment of production components, and any time a change occurs that invalidates the original results; see 7.7 Change Management.
Suppliers shall:

- Perform FAIs in accordance with AS/EN/JISQ9102.
- Account for all design characteristics with the FAI, including part marking, and interface characteristics that may be defined by industry standards.
- Provide Eaton with all applicable FAI documentation to prior shipment.
- Ensure FAI approval is received from the receiving Eaton business before shipping any additional production parts.
- Ensure records of approval from Eaton are maintained and logged such that FAI status can be verified prior to shipment.

Where PPAP is required for Aerospace components, Suppliers shall submit the required documentation in addition to the FAI. The Eaton business or supporting Supplier Development Engineer will provide direction on the PPAP documentation requirements.

7.3.8 PPAP

Suppliers are required to complete Production Part Approval Process (PPAP) packages as required by Eaton Aerospace standards, in accordance with AS9145, to demonstrate the ability to produce compliant product regularly. Potential program types, and PPAP requirements are shown in the table below :

Notes:

1) PPAP applies to all made-to-print parts, which include custom-designed components manufactured to specific engineering requirements. This process is not applicable to Commercial Off-The-Shelf (COTS), standard parts or one-time purchase parts unless otherwise specified by Eaton.

2) For modified COTS/standard components, the PPAP scope may be limited to include only the operations involved in the modification and inspection of the modified characteristics.

3) PPAP documents shall be submitted in accordance with appropriate export regulations, including, but not limited to ITAR, EUMIL, and EAR Licensable ECCN's

Program Type/Requirement Flow Down	Applicable PPAP Elements (in accordance with AS9145)
- NPI - For the introduction of new components or systems. - Print updates (New Revision Level). - Transition Projects – When production transitions from one facility to another, either within the same supplier or between suppliers. - High impact quality DMR & Customer NoE - Defect in product that significantly affects its performance, safety, or customer satisfaction or defect impacting directly to customer. - Parts identified during the Supplier Change Request (SCR) process SD-007. - Any change in the manufacturing process or method that may have an impact on the form, fit, or function of the product.	The following elements will be applicable when PPAP is requested by Eaton: - Design Records - Design Risk Analysis (only applicable to design organization) - Process Flow Diagram - Process Failure Mode and Effects Analysis (PFMEA) - Control Plan - Measurement System Analysis (MSA), as applicable - Initial Process Capability Studies, as applicable - Packaging, Preservation, and Labelling Approvals - First Article Inspection Report (Per AS9102) - Customer PPAP Requirements - PPAP Approval Form (Part Submission Warrant)
Eaton Plant PPAP flow down requirements, communicated ad hoc	Specific PPAP elements to be defined through risk identified during Eaton internal PPAP completion.Requirements to be noted per PPAP Request Letter/PPAP Checklist

Specific Aerospace Supplier PPAP tools, including Aerospace Supplier PPAP Workbook, which includes PPAP element templates, and Instructions for securely submitting PPAP packages are located here: http://www.eaton.com/us/en-us/company/selling-to-eaton/supplier-excellence/aerospace.html.

Suppliers may use their own PPAP element templates, or the templates provided in the Supplier PPAP Workbook. However, the 'Checklist' tab in the Supplier PPAP Workbook shall be referenced to ensure the Supplier meets all Eaton Aerospace requirements.

Suppliers are encouraged to complete PPAP by part family when applicable. See also 7.3.2 Process Failure Modes and Effects Analysis (PFMEA) above.See also 7.3.2 Process Failure Modes and Effects Analysis (PFMEA) above.

As Per AS9145 when Eaton specifies additional PPAP requirements not included in this standard, the Supplier shall include records of compliance in the PPAP files. Customer specific requirements may specify additional requirements or provide clarification of requirements, deliverables, and/or data submittals in this process.

7.7   Change Management

A supplier change request (SCR) is not applicable for a change of sub-tier source that provides industry standard parts or commercial off the shelf (COTS) items to Eaton Aerospace. The SCR requirement is also not applicable for Eaton drawings or part numbers with reference unmodified industry standard or COTS items. The supplier change request requirement does apply to modified COTS items.

Changes in sub-tier special process suppliers shall not require an SCR provided that the sources ar listed with the appropriate approval scope on Eaton Aerospace Group's External ASL and hold NADCAP certification for the special process being performed.

If a new material source is not AS 9120 accredited, the supplier must complete a Supplier Change Request (SCR) form for evaluation and approval prior to use.

Suppliers must perform a Delta First Article Inspection (DFAI) for any of the following changes between FAI and

production lots, if material is not controlled by recognized International Standard:

- Change in distributor or mill source of raw material.

- Change in raw material diameter.

DFAI shall confirm continued compliance with specifications and be submitted prior to production release.

8 Performance Evaluation (No additional requirements)

9 Improvement (No additional requirements)

10. Additional Aerospace Requirements

Foreign Object Debris/Damage (FOD) Prevention Program

Suppliers shall implement a FOD Prevention program necessary to reduce the occurrence of Foreign Objects, and the risk of Foreign Object Damage to Eaton products. The program shall be compliant with the requirements of National Aviation Standard, NAS 412, or AS9146 and meet the following pre-requisites:

- FOD prevention must be implemented in all areas identified to have the potential to introduce FOD to the product of manufacturing process.
- If critical FOD areas are identified, visual Physical Entry Controls shall be established with entry requirements posted outside of each area.
- FOD and material handling training must be provided to all individuals involved in the production, inspection, test, packaging, and material handling of Eaton products.
- Records must be maintained to document the training and may be assessed by Eaton upon request.
- Parts must be protected from handling damage in all areas; and standards for handling and storage documented accordingly.
- Supplier shall document all FOD incidents and perform root cause analysis. Metrics for FOD occurrence shall be recorded and subject of management review.
- Auditing of FOD prevention controls within all FOD critical areas shall be incorporated into the organization's Internal Audit plan.

Product Safety

Suppliers shall plan, implement, and control the processes to ensure product safety as per AS9100 to meet the following pre-requisites:

- Assessment of hazard and management of associated risks.
- Management of Safety critical items.
- Analysis and reporting of occurred events affecting safety.
- Communication of these events and training of persons.

Certification of Conformance (C of C)

Suppliers shall provide a certificate of conformance with each delivery to Eaton confirming that all Purchase Order terms, and technical requirements have been met. Where functional testing is used to confirm part conformity, evidence of testing shall be included with the certificate of conformance.

For unmodified industry standard, commercial off the shelf (COTS), or catalog items, Certificate of Conformance shall include:

- The product manufacturer's Certificate of Conformance which shall include the name, address, and contact information for the Supplier manufacturing location where applicable. Distributors Certificate of Conformance shall be included as applicable.
- Statement confirming compliance with Purchase Order and technical requirements (i.e. print, technical standards, etc.) from the supplier shipping the component(s)
- Signature from Supplier's authorized personnel to release shipment to Eaton.
- Part number and revision number
- Description of the product
- Quantity of the product (including the unit of measure)
- Traceability information including, serial numbers, lot numbers, heat lots where applicable.
- Deviation, production permit, or concession reference where applicable

For all other items, certificates of Conformance shall include:
- The name, address and contact information for the Supplier manufacturing location shipping the component.
- Date of shipment (with the preferred format of utilizing the ISO8601 standard [YYYY-MM-DD])
- Eaton delivery address
- Eaton Purchase Order number
- Unique reference number (example: shipping reference number)
- Part number and revision number
- Description of the product
- Quantity of the product (including the unit of measure)
- Traceability information including, serial numbers, lot numbers, heat lots where applicable
- Deviation, production permit, or concession reference where applicable
- Statement confirming compliance with Purchase Order and Technical requirements
- Signature from Supplier's authorized personnel to release shipment to Eaton

For Age-Sensitive or shelf life the Certificate of Conformance shall also include:
- Traceability information including material batch numbers
- Cure date (with the preferred format of utilizing the ISO8601 standard [YYYY-MM-DD])
- Shelf life or expiration date (with the preferred format of utilizing the ISO8601 standard [YYYY-MM-DD])
- Source construction number (hose/sleeve only)
Note: Separate packages and C of C documents shall be submitted when components from multiple heats or batches are shipped at the same time.

Raw Material (Mill) Certificates shall be ~~provided~~ Obtained along with the Certificate of Conformance and include the following:
- Chemical composition including base elements and percentages
- Traceability information including batch, heat or cast numbers as applicable
- Results of applicable mechanical testing and physical analysis in accordance with technical requirements
- Signature from Material Supplier's authorized personnel

And for above points for Raw Material supplier shall provide to Eaton on request basis.

When applicable, Special Process Certificates shall be provided along with the Certificate of Conformance and include:
- The special process supplier's name, address and contact information
- Part number and revision level

- Purchase order number
- The process(s) performed including all controlling specifications and revision levels
- The special process supplier's NADCAP certificate.
- Applicable test results
- Traceability information including, serial numbers, lot numbers, heat lots as applicable
- Signature from Supplier's authorized personnel

Where available, Certificates of Conformance and associated documentation may be submitted electronically, as directed by the Eaton business.

In addition to the above, when required by contract, components procured from a supplier holding an Airworthiness Approval are to be supplied with the applicable Airworthiness Tag/Certification (i.e., EASA Form1 or 8130 tag).

Revision change history

Rev	Revision Date	Updated By	Approved By	Key Sections updated
A	Sep-2024	Aerospace Group Supplier Development & Quality	Katie Sexton	Initial release of separate Aerospace Group document containing additional requirements above and beyond SEM previously contained within the main SEM
B	Sep-2025	Alex Plewka	Katie Sexton	Added title, Name and Date for signature on first page

Section 3 Terms & Definitions: Added flight hardware definition.

Section 4.1. In table of QMS Requirements: Included a note to clarify that Nadcap suppliers are required have a certified QMS. Further, require evidence of Eaton approval to continue business with suppliers which do not meet the QMS requirements specified within this document

Added ' provide access to Eaton to witness the relevant data within OASIS and NADCAP database' and 'Suppliers must demonstrate compliance with all industry standards specified in Eaton Purchase Orders. Additionally, personnel involved in these processes must be certified and/or adequately trained to perform their respective roles' |

| | | | | Section 7.3. Product Realization: The paragraph was reworded to emphasize the usage of systems and tools to control manufacturing conditions.

Section 7.3.2 Added 'Include recommended actions for higher RPN line items, where RPNs have been analysed using Pareto Top 10, 'RPN greater than X' (RPN threshold ' X' is defined at a plant level based on capacity and resource)

Section 7.3.3 Control Plan: Replaced the requirement of having a PFMEA by a Control Plan, for a group or family of components and required Eaton's approval.

Section 7.3.5 Process Capability: Linked the KC to Eaton and contracts requirements. Made the Cpk ≥1.33 a desirable target rather than a mandatory requirement to avoid DMR misinterpretation.

Section 7.3.6 Inspection: Added clarification to the source inspection paragraph. Removed the requirement of storing FAI within WISPER given other sites use different ERP Systems (e.g. SAP, etc.).

Section 7.3.6 – Under FAI Inspection reframed the sentence to ensure FAI approval before shipping any additional production parts. Section 7.7 – Added-SCR to be filled if raw material supplier is non-AS9120.

Section 7.3.8 PPAP: The entire section was reworded adding additional definition around the PPAP process. The chart was revised to add definition around the program type/requirement |
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				flow-down and appliable PPAP elements. Added a paragraph to clarify the scenario when additional requirements from Eaton/Customer are requested but not listed within AS9145.
				Section 9 Improvement was added to mirror SEM.
				Section 10 – a) In Foreign object debris / Damage (FOD) prevention program added 'AS9146' under requirement of National Aviation standard. b) Added Product safety parameters under Additional Aerospace requirements. c) Under certification of conformance (CoC) – Replace the word 'provided' with 'obtained' under raw material certificates. Added point below Raw material 'And for above points for Raw material supplier shall provide to Eaton on request basis' Clarified the C of C requirements for distributors. Added the unit of measure as part of the quantity of product. Standardized ISO8601 as the preferred format to record date of shipment, cured date, shelf life/expiration.

End of Document