

First Article Inspection (FAI) Checklist

Purpose:

Although the International Aerospace Quality Group (IAQG) member companies are solely responsible for the content of the AS/EN/SJAC9102 document, this is not a restatement of the AS9102 document and may not cover the 9102 document in its entirety. The only true method to ensure compliance to the intention of the standard is to obtain one from your Distribution Body (SAE, ASD or SJAC depending on your IAQG sector. This checklist is only intended to assist a person with reviewing their companies' first article inspection program requirements as they exist today.

The IAQG has indicated an effective means of complying with the regulatory requirement will be a First Article Inspection (FAI) program. Many of the today's manufactures have incorporated a FAI process into their quality management system (QMS) program and have made it an integral part of their manufacturing process. This checklist was developed using the 9102 and current regulatory requirements as a guide.

Note: *This review does not include standard hardware as described in Federal Aviation Administration (FAA) Advisory Circular (AC) 43.13, which is the FAA definition of standard hardware. However, all standard hardware should still be treated with the same importance as manufactured products, because the final product that includes standard hardware will have the airworthiness affected if the manufactures' identified hardware was not used in the manufacturing process.*

Documentation:	Doc Ref	Yes	No	N/A
1) Has all the applicable documentation for the manufacturing/appropriate process and quality plan been reviewed as required by AS/EN/SJAC9102?				
2) Are the routing sheets properly identified and maintained according to customer and regulatory requirements?				
3) Is the quality plan for the FAI complete?				
4) Are the correct forms are being used (AS9102 forms 1, 2 and 3, or equivalent), and do they contain all applicable information and ensure inspection results are complete and correct (e.g., within engineering tolerance)?				
5) Have all the referenced documentation that support the FAI been reviewed for completeness (e.g., inspection data, test data, Acceptance Test Procedures (ATP), etc.)?				

Test sheets and data verification:	Doc Ref	Yes	No	N/A
1) Is the ATP approved, revision controlled, revised by authorized personnel, and retention requirements in accordance with customer and regulatory requirements?				

Test sheets and data verification:	Doc Ref	Yes	No	N/A
2) Are the applicable ATP data sheets and inspection operations complete and acceptable (e.g., within engineering tolerance)?				

Supplier Certification Program:	Doc Ref	Yes	No	N/A
1) Are the supplier material certification documents reviewed for compliance to the applicable regulatory authority?				
2) Are the in-house material certifications reviewed for completion and to ensure the documents meet the applicable requirements?				
3) As applicable, are all special processes approved?				
4) Are all applicable manufacturing and routing documents referencing the correct specification?				
5) Are all key characteristics requirements being inspected?				
6) Has every design characteristic requirement been completed, accounted for, uniquely identified and has inspection results traceable to each unique identifier?				

Supplier Certification Program:	Doc Ref	Yes	No	N/A
<p>7) Do the following documents meet the customer expectations?</p> <ul style="list-style-type: none"> - Purchase order - Contract review - Material verification - Processing - Specification compliance - Heat treatment - Non Destructive Testing (NDT) - Dimensional Inspection - Interchangeability (ICY) - Finish required - Function test - Configuration - Identification 				
<p>8) Is there evidence of performing an FAI on all first production runs?</p>				

Supplier Certification Program:	Doc Ref	Yes	No	N/A
9) Is there evidence that production and inspections tools and processes are those that will be used in serial production (if not, have possible impact of changes been evaluated to decide if future partial FAI will or will not be required)?				

Non-Conformance Procedures:	Doc Ref	Yes	No	N/A
1) Has all non-conformance documentation been reviewed for completeness?				
2) In case of one or several subjects for verification are not acceptable, are they? <ul style="list-style-type: none"> - Adequately recorded for Corrective Action Request - Communicated to the customer, and when applicable subject of a request for concession - Submitted to complementary FAI before delivery and/or on next production part 				

Administrative:	Doc Ref	Yes	No	N/A
1) If the manufacture has delegated authority to suppliers to make major inspections of parts or assemblies for which the manufacture is responsible, has the manufacture notified the customer of such arrangements?				

Quality Program:	Doc Ref	Yes	No	N/A
1) Does the quality program include a statement describing assigned responsibilities and delegated authority of the quality control organization?				
2) Does the quality control program include a chart indicating the relationship of the quality control organization, management, and organizational components indicating the chain of authority and responsibility within the quality control organization?				
3) Does the quality program include a description of the methods used for production inspection of individual parts and complete assemblies, including the identification of any special manufacturing processes involved, the means used to control the processes and the final test procedure for the complete product?				

Quality Program:	Doc Ref	Yes	No	N/A
4) Does the quality program include an outline of the material review system, including the procedure for recording review board decisions and disposing of rejected parts?				
5) Does the quality program include an outline of a system for informing company inspectors of current changes in engineering drawings, specifications, and quality control procedures?				
6) Are operations/inspections requiring certification performed by certified personnel?				

Tooling Program	Doc Ref	Yes	No	N/A
1) Are all appropriate tools and inspection equipment identified in the inspection documentation and are they available for use by the appropriate personnel?				
2) Are the appropriate tooling and equipment being used as required?				
3) Are all tooling items properly calibrated?				

Tooling Program	Doc Ref	Yes	No	N/A
4) Is the tooling and measuring equipment as applicable, traceable to an acceptable national standard and are the validation/certification documents available for review?				

Comments: