

Routine: Q-V40 Supplier	<b>AS-9102 Rev.A INSTRUCTIONS</b> <b>AMPHENOL SUPPLIER VERSION</b>	Issue Number: <b>01</b> <i>09-29-10</i>	Sheet 1 of 4
Written: R. Neuberger      Approved: S. Klein			

**GROUP 1 - GENERAL INSTRUCTIONS**

The FAIR applies only to the top level part number being purchased. Subcomponents of the assembled connector (such as inserts, shells and coupling nuts of a connector) do not require an individual FAIR.

If a FAIR is on file for a previous revision, and the customer and site are the same, then a new FAIR should be completed for ONLY the differences between the two configurations.

DELTA FAI: Complete the Forms 1, 2, 3 to detail all changes made in a new revision release for a document since the last FAI. A FAI should be on file detailing each revision change and the fact that we reviewed its impact.

All forms must be signed by the QE representative signifying review of the forms.

**GROUP 2 - REQUIRED DOCUMENTS**

1) The AS-9102 required forms must be printed out from the Amphenol Aerospace Operations web site:  
<http://www.amphenol-aerospace.com/supplier.asp>

*NOTE:*

1. The form name is QDF Q-V40 SupplierAS-9102A FAIR.xls
2. This form is in Microsoft Excel format.
3. There are 3 pages which all have to be printed.
4. Use the tabs at the bottom of the Excel screen to get to each form.

NOTE: Instructions for completing the Forms 1, 2, 3 are available on screen by placing the screen cursor over the red dot in the box to be completed.

**GROUP 3 - FORM 1: PART NUMBER ACCOUNTABILITY**

**To be completed by the Supplier QE representative.**

Complete the following boxes:

1. Part Number: Amphenol part number, (or Supplier part number).
2. Part Name: from drawing title block or listed on PO.
3. Serial Number: required if available, found on part.
4. FAI Report Number: optional, normally not used.
5. Part Revision Level: rev level of part as built.
6. Drawing Number: Amphenol drawing number, or Supplier drawing number if no Amphenol drawing listed.
7. Drawing Revision Level: Amphenol drawing revision, or Supplier if no Amphenol drawing listed.
8. Additional Changes: List any attached customer ECN's not incorporated into the Amphenol drawing, or Amphenol ECN's if Amphenol drawing.
9. Manufacturing Process Reference Number: enter a reference number that provides traceability to the manufacturing record of the FAI part (e.g., router number,

Routine: Q-V40 Supplier	<b>AS-9102 Rev.A INSTRUCTIONS</b> <b>AMPHENOL SUPPLIER VERSION</b>	Issue Number: <b>01</b> <i>09-29-10</i>	Sheet 2 of 4
Written: R. Neuberger      Approved: S. Klein			

manufacturing plan number, etc.)

10. Organization Name: Supplier’s Company Name
11. Supplier Code: Supplier code found on purchase order. If no PO, then enter Supplier’s Name.
12. PO Number: enter the Amphenol PO number from the Purchase Order.
13. Detail or Assembly FAI: detail = single part, assembly = FAI of multiple parts.  
*i.e. (connector + contacts + tools) = assembly. Connector with contacts installed = detail*
14. Full or Partial FAI: indicate which. If partial, (i.e. doing a delta FAI due to a rev. change) indicate that reason, otherwise indicate ‘full’.
- 15 to 18. Required ONLY if item 13 is checked as an ‘assembly’.
15. Part Number: enter the part numbers of the components to be included for FAI.
16. Part Name: from drawing title block
17. Part Serial Number: (if applicable), located on the component.
18. FAI Report Number: Amphenol utilizes the individual part number for this.
19. Supplier QE representative signs here after verifying completeness of form 1.
20. Supplier QE rep. enters today’s date.
23. Amphenol Approval signature
24. Amphenol Approval Date: Amphenol to enter date of approval.

*NOTE: If SIMILARITY rule was used, refer to Group 1 Instructions.*

**GROUP 4 - FORM 2: PRODUCT ACCOUNTABILITY**

**To be completed by the SUPPLIER QE representative.**

Complete the following boxes.

1. Part Number: Amphenol part number, (or Supplier # if no Amphenol number).
2. Part Name: from drawing title block or listed on PO.
3. Serial Number: required if available, found on part.
4. FAI Report Number: optional, normally not used.
5. Material or Process Name: From the drawing list the name of the material or process, (i.e. plating, heat treat, material). Check Notes also. List only the processes, specifications or materials that apply to this part. It is NOT required to validate embedded documents found in the listed process or specification.
6. Specification Number: From the drawing, (check Notes also) list only the processes, specifications or materials that apply to this part. (For example: QQN290, Mil-C-39029, stainless steel). It is NOT required to validate embedded documents found in the listed process or specification.
7. Code: not used, no entry to be made.
8. Special Process Supplier Code: list special processor name. If not Primary Supplier, list address also.
9. Customer Approval Verification: Normally ‘n/a’ will be entered here.
10. Certificate of Conformance Number: for example: raw material test report number, a traceability number, work order number, etc.
11. Functional Test Procedure Number: List functional test procedures called out as a design requirement on the print. Such as special electric tests, fluid tests, etc.

Routine: Q-V40 Supplier	<b>AS-9102 Rev.A INSTRUCTIONS</b> <b>AMPHENOL SUPPLIER VERSION</b>	Issue Number: <b>01</b> <i>09-29-10</i>	Sheet 3 of 4
Written: R. Neuberger      Approved: S. Klein			

- 12. Acceptance Report Number, if applicable: List the engineering report or qual. report that serves as objective evidence for the test procedure listed in item 11.
- 14. QE representative Signature/Date: Supplier QE representative signs here after verifying completeness of form 2. Enter today's date.
- 14b. Amphenol Signature/Date.

- *NOTE:* All dimensions must have a tolerance. Every feature on every manufactured part is subject to variation, therefore, the limits of allowable variation must be specified. Plus and minus tolerances may be applied directly to dimensions or applied from a general tolerance block or general note. For basic dimensions, geometric tolerances are indirectly applied in a related Feature Control Frame. *The only exceptions are for dimensions marked as minimum, maximum, stock or reference.*

**GROUP 5 - FORM 3: CHARACTERISTIC ACCOUNTABILITY**

If present, ALWAYS use the drawing unless otherwise directed by Quality management.

1. Enter Amphenol part number, (or Supplier part # if no Amphenol number is listed).
2. Part Name: from drawing title block or listed on PO.
3. Serial Number: required if available, found on part.
4. Deleted/not used.
5. Characteristic Number: 'Balloon' number each characteristic, all diagrams, dimensional table columns individually, other Tables, sketches and all notes of the drawing or specification and list those numbers here. If the page does not apply to the part being measured, then a single balloon for an entire page is acceptable.
6. Reference Location: location of the characteristic, (drawing zone, page number or section). List, as a , minimum, the page number location of the balloon item number.
7. Characteristic Designator: if applicable: record the characteristic type, (flight safety, critical, major, etc).
8. Requirement: List requirement from drawing. List dimension and tolerance or note number, or enough information to be able to identify which feature is being addressed. If a 'REFERENCE DIMENSION' these do not have to be listed.
9. Results:
  - It is preferred that variables data be documented for all measurements. Results must be recorded in the same units as specified on the drawing or specification.
  - If actual measurement is taken for FAI, enter variables data here.
  - For features that call out 2 or more places that the dimension applies to, all locations must be measured and recorded on the form.
  - If a print out is obtained of dimensions, such as a TP X-Y printout and chart or CMM printout, then attach the printout to the Form 3 and reference the printout. Do not copy the data over onto Form 3.
  - It may be necessary to balloon specific items on the printout for ease of identification from the Form 3 entry to the printout data.

Routine: Q-V40 Supplier	<b>AS-9102 Rev.A INSTRUCTIONS</b> <b>AMPHENOL SUPPLIER VERSION</b>	Issue Number: <b>01</b> <i>09-29-10</i>	Sheet 4 of 4
Written: R. Neuberger      Approved: S. Klein			

- If general note, then enter 'Accept' or 'Fail' OR N/A if not applicable.
- Reference Dimensions displayed in a box can be noted as "Ref", Reference Dimensions that list a range or a tolerance are to have the measurements recorded and if not within listed range or tolerance be recorded as a failure.

- 9a. Pass/Fail: Enter 'P' or 'F' whether the feature passed or failed the requirement.
10. Gauging: If a gage is used to measure the feature, record the gage number and serial number here.
11. Nonconformance Number: list the reject ticket number.
12. Prepared By and Date: **Gage Inspector** must sign and date the form in this block.
13. Incorporated into item 12.
14. Drawing number/Rev: List the drawing and revision being used for the FAI dimensions.
15. Routine # / issue: list the inspection routine being used.

MARKING and STAMPING: (Photos may be used to document)  
 Marking and the BAG (tag) marking meet the stated requirement. This applies not only to the ink stamping of the shell, but also to the molded insert hole identification, if referenced on the print. The outer container labeling must be verified if referenced on the print or in the specification.

**The QE representative must assure that ALL NOTES have been listed and FAI information entered.**

Address all known omissions and problems as documented by the Gage Inspector.  
 Assure that all Corrective Actions have been filed.  
 At the top of the page: enter the signature of the QE representative and date after reviewing this document.

**GROUP 6 - FORM 3: CONTINUATION OF FORM 3**

Same entries as required for Form #3.

**GROUP 7 - REQUIRED DOCUMENTS FOR FAI PACKAGE COMPLETION**

**TO BE COMPLETED BY QE representative**  
 (Refer to section 5.2 of SAE AS9102 Rev A; Evaluation)

The following documents must be filed or verified as part of the FAI report:

1. Material verification will be accomplished by reviewing the Bill of Material as compared to the drawing requirements.
2. AS-9102 Rev A FAI forms completed, signed, with all referenced attachments.
3. Marked up drawing, (balloon drawing) correlated to the measurements recorded by Gage Inspection.
4. Any letters of deviation issued with the quote and/or order acknowledgement.

Note: N/A = Not Applicable