



## Supplier Audit Process

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# Change History

Effective Date	Revision	Created By	Description of Change
5/14/2024	A	Rich Welch	Initial release of process and its related documents.

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## 1. Purpose, Scope, and Users

### 1.1. Purpose

The purpose of this process is to define the methods for conducting a process-based supplier quality audit by CFD Research Corporation, herein known as CFD Research.

These audits aim to ensure conformance as follows:

- With a Quality Management System (QMS) such as ISO9001 and AS9100 along with customer, statutory, and regulatory requirements.
- Supplier's actual practices against customer requirements and those of CFD Research.

### 1.2. Scope

This process is applicable to all CFD Research external providers of products, processes, and services, herein known as suppliers within the scope of the QMS.

### 1.3. Users

**Supplier Quality** has the following responsibilities:

- Oversee the scheduling and planning of supplier audits.
- Ensure execution of this process.
- Approve/reject *FM-QA-0007, Supplier Audit Report* and *FM-QA-0006, Supplier Audit Survey*.
- Maintain and retain supplier audit records in the respective supplier's folder.
- Acts as the audit lead.

**Purchasing and Subcontract Agent** has the following responsibilities:

- Assist Supplier Quality by ensuring suppliers partake in supplier audits to include timely completion of a *Supplier Audit Survey*.
- Notify Supplier Quality when a new supplier source is being requested and when an existing supplier is not meeting expectations.
- Perform on-site supplier audits with Supplier Quality upon request.

## 2. Supplier Audits

### 2.1. Auditor Selection

Supplier auditors are selected by Quality and Procurement Management from the pool of qualified employees. Qualified employees from one site may partake in supplier audits for another site.

To become a supplier auditor, the employee must meet one of the following conditions:

- Minimum of an 8-hour AS9100 or ISO9001 internal auditor training program and completion of at least two internal audits with one being Purchasing
- OR**
- Receipt of training from an accredited, industry-recognized Quality Auditor certification programs such as ASQ CQA, Exemplar, and Probitas Certified Auditor.

Outside of the above requirement, selected auditors must understand CFD Research's internal processes such as Purchasing, Receiving Inspection, Contracts, and Design and Development as well as regulatory requirements such as OSHA.

CFD Research may utilize approved consultants for its Supplier Audit program so long as the consulting auditor:

- Has themselves, or their organization, evaluated and approved per the supplier selection requirements within *QSP-PUR-0001, Purchasing Process*.
- Is included on CFD Research's *Approved Supplier List*.
- Has verifiable references related to ISO9001 and/or AS9100 experience.

Supplier Auditor consultants are treated as an outsources service and may have additional controls defined within their contract. Additionally, consultants must follow CFD Research's processes and use its forms, templates, and checklists.

## 2.2 Supplier Audit Schedule

The supplier audit schedule is controlled within *TMP-QA-0006, Supplier Audit Log* and is updated annually. Suppliers will be notified within 60 days of their scheduled audit date to allow for deconfliction of any issue. Audits may be scheduled more frequently if a supplier has an increase of nonconformance reports or corrective and preventive actions or their supplier rating does not meet the requirements defined in the *Purchasing Process*. Audit frequency may also increase based on a decision by CFD Research's management team, customer input, or recommendation from a Material Review Board (MRB), Corrective Action Board (CAB), or customer.

Supplier Quality, or other Quality Management, plans each audit according to needs, management decisions, or customer requirements. Audit results are recorded using *Supplier Quality Survey* or *FM-QA-0007, Supplier Audit Report* with both being logged in the *Supplier Audit Log*.

## 2.3 Conducting a Supplier Audit

Supplier audits ensure ongoing conformance related to CFD Research's policies and processes, QMS standards, and customer, statutory, and regulatory requirements. To verify this conformance, a supplier's top-level processes are audited against:

- Requirements of ISO9001 and/or AS9100
- Supplier's QMS documentation
- Customer flow down requirements
- Regulatory and statutory requirements

Supplier audits may occur via onsite or desktop. When a survey is requested, a *Supplier Quality Survey* is sent via email to the supplier with an expected return within 7 business days.

The audit is conducted per the *Audit Report* as follows:

1. **Audit planning** – Define the audit scope and dates, auditor(s), customer-specific requirements, applicable standard clauses, and types of QMS documentation to review.

2. **Compare Suppliers Documentation vs. Customers/CFD Research Requirements** – Auditor(s) will review all applicable requirements listed in step 1 and the applicable QMS documents noting any significant discrepancies and opportunities for improvements with the documentation.
3. **Compare Actual Practice vs. Requirements** – Auditor(s) will compare the supplier’s actual practice against its QMS requirements, customer’s requirements, and those of ISO9001 and/or AS9100.
  - a. This comparison is accomplished by interviewing employees, examining objective evidence, and witnessing a process/activity. Objective evidence is recorded to show conformance or nonconformance.
4. **Review of Previous Audit Results/Findings** – Auditor(s) will review the previous audit report and any findings and the effectiveness of any correction or preventive action or other continuous improvement.
5. **Verify Process Effectiveness** – Suppliers shall answer questions aimed at verifying the audited process is either effective and not prone to any nonconformity or ineffective and will receive a minor or major nonconformance.
  - a. **Fully effective** – The supplier is free of nonconformances though it may have one or more opportunities for improvement (OFIs).
  - b. **Is not fully effective** - The supplier has a minor nonconformance.
  - c. **Is not effective** – The supplier has a major nonconformance.
6. **Nonconformance Summary** – If present, each audit nonconformance shall be clearly defined to include reference to a specific standard and/or clause or other requirement not met using *FM-QA-0001, Corrective and Preventive Action Request* per *QSP-QA-0001, Corrective and Preventive Action Process*.

## 2.4 Supplier Audit and Survey Results

Audit and survey results are recorded using the *Supplier Quality Survey* or *Supplier Audit Report* with both being logged in *Supplier Audit Log*. The survey and report must be completed—reviewed and approved—within 5 business days of receipt from the supplier. When required, customer-specific reports and surveys must be completed within their defined timeline. The most recent results—percentage of supplier’s audited/surveyed, audit days to complete, and supplier concerns—must be reported during the next Quarterly Management Review.

When a nonconformance exists, each must include three elements as follows:

1. **Requirement Statement** – Document or clause of the applicable standard violated.
2. **Objective Evidence** – Indication of objective evidence supporting the nonconformity, such as documents, interviewee response, products and processes reviewed. Sufficient detail is required to ensure it can be found after the audit’s conclusion.
3. **Nonconformance Detail** – Brief statement on why the objective evidence shows a nonconformity against the requirement or internal documented information.

For each documented nonconformance, the supplier shall ensure corrective action is taken without undue delay to prevent recurrence. During all corrective action effectiveness reviews, the results of action(s) taken shall be evaluated and the results of the evaluation recorded. Additionally, where there is an impact on product quality,

product safety, and customer satisfaction, containment is required, up to and including product recall.

## **2.5 Special Process Audits**

Special processes such as Non-Destructive Testing (NDT), Weld, Heat Treat, Painting, and Conformal Coating may require additional technical resources. These resources can be sought in-house or through third parties, so long as they meet the requirements of the auditor selection. Where the customer requires completion of their own audit documents, these shall be used and retained in the respective audit folder prior to return to the customer.

## **2.6 Customer Audits**

Customer audits will be conducted at intervals set forth by the customer or their designated representative. As assigned, adherence to customer requirements and documentation shall occur.

## **3. Reference Documents**

- AS9100, Quality Management Systems – Requirements for Aviation, Space, and Defense Organizations
- ISO9001, Quality Management Systems - Requirements
- QSP-PUR-0001, Purchasing Process
- QSP-QA-0001, Corrective and Preventive Action Process
- General Terms and Conditions

## **4. Quality Records**

- FM-QA-0001, Corrective and Preventive Action Request
- FM-QA-0006, Supplier Audit Survey
- FM-QA-0007, Supplier Audit Report
- TMP-QA-0005, SCAR Letter
- TMP-QA-0006, Supplier Audit Log
- Approved Supplier List

## **5. Process Objective**

To assess external providers of products, services, and processes to ensure each fulfill requirements set forth by CFD Research, its customer, and statutory or regulatory standards.