Safety Attributes

Elevate your Safety Performance.

Summary

This presentation offers a detailed look at the Safety Attributes and can help you, Certificate Holders or Applicants, better understand how to integrate Safety Attributes into your systems and processes to take a proactive, structured approach to managing safety.

Safety Attributes are the qualities present in a well-designed, safety-centered system and process to help ensure repeatable safety performance.

They are relevant and beneficial to all Certificate Holders and Applicants regardless of size and scope, and when incorporated into a Certificate Holder's or Applicant's systems, help manage risk in safety critical processes.

Actively manage your safety by integrating Safety Attributes.

For questions and support, contact your local Flight Standards District Office (FSDO):
https://www.faa.gov/about/office_org/field_offices/fsdo/all_fsdos/

For more information:
https://www.faa.gov/about/initiatives/GASafetyOutreach

Table of Contents

Introduction to Safety Attributes

- Safety Attributes Definitions
- Application and Examples
- Helpful Tips
- Next Steps, Contact Information, and Links

Safety Attributes Overview

- Safety Attributes are relevant and beneficial to all Certificate Holders and Applicants
- Managing safety can be scaled for the size, scope, and complexity of your operation
- Incorporating Safety Attributes into your systems, processes, and procedures is a proactive, structured approach to managing safety

What are Safety Attributes?

- Safety Attributes are the **qualities present in a well-designed, safety-centered system and process**
- They help to ensure **repeatable safety performance**

Why are Safety Attributes important?

- Incorporating the Safety Attributes into each system and each process **increases confidence in process reliability, resulting in consistent, compliant, and safe outcomes**
- Safety Attributes are **not required by regulation**; however, when incorporated into the Certificate Holder's or Applicant's systems, they **help to optimize safety by identifying hazards and controlling risk**

There Are Seven Safety Attributes

1. Responsibility
2. Authority
3. Procedures
4. Controls
5. Process Measurement
6. Interfaces
7. Safety Ownership

- Introduction to Safety Attributes

Safety Attributes Definitions

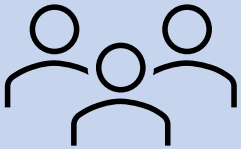
- Application and Examples
- Helpful Tips
- Next Steps, Contact Information, and Links

Safety Attributes Definitions

Safety Attribute	Definition
Responsibility	A clearly identified individual who is accountable for financial and human resources to ensure the Certificate Holder's quality and safety performance
Authority	A clearly identifiable, qualified, and knowledgeable individual who effectively plans, directs, and controls resources; changes procedures; and makes key determinations including safety risk acceptance decisions
Procedures	Methods or practices that are written or unwritten, regulatory or non-regulatory, designed into a process that a Certificate Holder or Applicant uses to achieve a desired result
Controls	The checks and restraints within a process that ensure the potential effects of risks are reduced to an acceptable level
Process Measurement	A method to monitor and measure a process' outputs and performance, and identify problems, or potential problems, to take corrective action
Interfaces	Interactions between processes that must be managed to ensure desired outcomes
Safety Ownership	An individual's understanding of how their role contributes to the overall safety of the organization

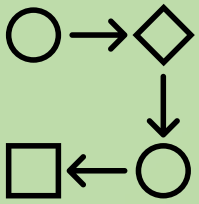
A Different View of the Safety Attributes

PERSONNEL-RELATED



- Responsibility
- Authority
- Safety Ownership

PROCESS-RELATED



- Procedures
- Controls
- Process Measurement
- Interfaces

- Introduction to Safety Attributes
- Safety Attributes Definitions
- **Application and Examples**
- Helpful Tips
- Next Steps, Contact Information, and Links

Safety Attributes Applied Definitions (1 of 2)

Safety Attribute	Applied Definition
Responsibility	Centers on a single individual in executive management who controls the resources. Resources include adequate personnel and budget for facilities, parts, tooling, contractor support, and any other resources required to ensure the organization's safety performance and objectives
Authority	Refers to process owners who manage specific technical functions. They may: • Speak with authority on behalf of the company • Set additional workforce expectations • Be responsible for: – Properly using resources – Changing processes or procedures as operations change – Accepting operational risk within their process areas
Procedures	Focuses on whether the organization or individual has sufficient documented procedures to ensure consistent safety performance and regulatory compliance and whether personnel are following established processes and procedures

Safety Attributes Applied Definitions (2 of 2)

Safety Attribute	Applied Definition
Controls	Controls may be: • Administrative (e.g., a checklist or initials/signature on a form) • Personal protective equipment (PPE) (e.g., safety glasses or ear defenders) • Physical (e.g., a switch guard or landing gear pins) • Procedural (e.g., order of steps or a step within a process to ensure a safe outcome)
Process Measurement	Focuses on the data collection and data analysis used by organizations and process owners to assess process performance. The data gathered can be used to develop corrective action(s). Typically, audit programs are associated with process measurement; however, data/information can be gathered from a broad range of operational outputs that occur as part of the day-to-day operational activities (e.g., logbooks, flight cancellations, or employee hazard reporting)
Interfaces	Refers to a point where two or more systems, subjects, organizations, etc. meet and interact. This attribute is used to observe how divisions within an organization and interdependencies between processes or procedures interact
Safety Ownership	Focuses on all employees in the organization and relates to employees' understanding of their contribution to the organization's safety performance

Safety Attributes Examples: **Responsibility**

A repair station just acquired a new hanger at the airport across town and is beginning to provide maintenance service there. The CEO directed his management team to have the facility fully functional, delivering the same services at both locations as soon as possible. The CEO, although obligated to provide adequate resources, did not supply additional resources.

During their planning meeting, the CEO told the employees they are going to have to “tighten their belts and do the best they can” until more personnel can be hired, trained, and new equipment purchased, which will take until next year.

In this example, the person with *Responsibility* (in this scenario the CEO) is not providing adequate financial resources, human resources (employees), or equipment.

R E S P O N S I B I L I T Y

Safety Attributes Examples: **Authority**

The CEO of a part 135 (9 or less) Certificate Holder authorized the purchase and use of a new type of aircraft for its operations. The CEO provided the financial resources to make this happen.

The Director of Maintenance (DOM) and Director of Operations (DO) revised the applicable manuals and operations specifications for approval, provided the required aircraft training, and purchased the equipment and tools to maintain the aircraft.

In this example, the persons with *Authority* (in this scenario, the DOM and DO) both managed the financial and human resources provided by the CEO.

A U T H O R I T Y

Safety Attributes Examples: **Interfaces**

Continuing the scenario from the prior slide where a new aircraft was added to the fleet: are the two directors communicating with one another when they are making changes to procedures? A change in one department may affect multiple departments.

The flight department established a new procedure for the new aircraft. The pilots are being trained and are required to apply the rudder gust lock after parking the aircraft. This is not a procedure required on their existing fleet.

Has the flight department notified the maintenance department of this new procedure? If not, there is a high possibility of the new aircraft being towed with the rudder gust lock installed, potentially causing damage to the aircraft.

Failure to communicate the new procedure shows a lack of *Interface*.

I N T E R F A C E S

Safety Attributes Examples: **Safety Ownership**

A ramp employee for a part 135 (9 or less) observed the belt loader operator strike the propeller of a company aircraft, causing the plane to move. The belt loader operator stopped and looked around, noticed no damage, and drove off.

The ramp employee immediately notified his manager and the aircraft maintenance manager. When the pilots arrived at the aircraft, the ramp employee also informed the pilots of what he observed.

In this example, the belt loader operator does not understand how his actions affect the overall safety of an organization; however, the ramp employee clearly understood his role in *Safety Ownership*.

S A F E T Y O W N E R S H I P

Safety Attributes Examples: **Controls**

Continuing the scenario from the previous slide where a part 135 (9 or less) ramp employee observed a belt loader operator strike the propeller of a company aircraft, causing the plane to move. The ramp manager established a new procedure to place reflective safety cones around parked company aircraft to ensure vehicles maintain a safe distance from the aircraft.

This is a *Control* for vehicle movement around parked aircraft.

C O N T R O L S

Safety Attributes Examples: **Procedures**

Procedures are the step-by-step instructions that management provides to achieve repeatable outcomes.

When a company aircraft is being fueled by a vendor, not directly controlled by the company, the policy states, “A qualified flight crewmember must supervise all vendor fueling of company aircraft.”

The fueling procedure states, a crew member will:

- *Stand by the aircraft fueling port before refueling begins and during the fueling process.*
- *Confirm the truck is labeled with proper fuel signage.*
- *Confirm fuel has appropriate color to the signage.*
- *Confirm quantity loaded matches the quantity requested.*
- *Once fueling is complete, initial and date the fuel slip as verification that all procedural requirements were met.*

The *Procedure* establishes “how” the policy will be accomplished. Policy is what the organization expects their employees to do and why they are doing it; a Procedure explains how to do it.

P R O C E D U R E S

Safety Attributes Examples: **Process Measurement**

A part 135 utilizes the services of a part 142 training center.

The operator is measuring (assessing) the training program for failure rates on maneuvers and crew competency.

The Certificate Holder has a process on how they qualify a crewmember. Within that process they are monitoring (tracking) and measuring (through audits) the outcome of the training. Pass/ fail rates of the crewmembers are analyzed. If a negative trend is identified for a particular maneuver or event, then a corrective action is taken.

Process Measurement allows you to identify failures to take corrective action.

P R O C E S S M E A S U R E M E N T

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Helpful Tips (1 of 3)

Safety Attribute	Helpful Tips
Responsibility	• As appropriate, in relevant chapters in a Certificate Holder's manual, add the title for the responsible person for the system/process/department outlined in that chapter • Include the definition for the Responsibility Safety Attribute in the manual so responsibilities and scope of authority are clear • The responsible person is the one clearly identifiable person whose responsibility is to set policy, and allocate resources (financial, material, human resources, etc.) • Responsibility cannot be delegated
Authority	• As appropriate, in relevant chapters in a Certificate Holder's manual, add the title for the person with authority for the system/process/department outlined in that chapter • Include the definition for the Authority Safety Attribute in the manual so responsibilities and scope of authority are clear • The individual with authority implements policy, requests additional resources as needed, approves staffing, oversees day-to-day operations, etc. • Process owners have the authority to implement new processes, make changes to existing processes, and make risk acceptance decisions

Helpful Tips (2 of 3)

Safety Attribute	Helpful Tips
Procedures	• Place process documentation in an easily accessible location • During regular meetings, emphasize the importance of using the procedures even if you "already know what to do" • Policy specifies what we are doing; procedures specify how we carry out the policy/mission • Write procedures clearly enough and with enough instruction/detail so personnel can perform the task safely
Controls	• Controls are put in place to mitigate risk, for example: gust locks, switch covers, wheel chocks, checklists, Flight Risk Assessment Tool (FRAT) • Controls are often built into procedures; however, they can also be stand-alone
Process Measurement	• Implement processes to collect data on your operations to measure safety performance against safety objectives • Analyze the data and assess whether there are hazards or ineffective risk controls to be managed

Helpful Tips (3 of 3)

Safety Attribute	Helpful Tips
Interfaces	• Develop written processes for how interdependencies between processes or procedures interact or how various divisions of an organization interact • Take interfaces into consideration when a procedure changes — the change may impact other procedures
Safety Ownership	• Highlight actions employees can take in their day-to-day work activities to support the organization's safety initiatives • Discuss with employees what safety concerns exist in their work areas and how they can support safety-related improvements • Ensure employees know how they can raise suspected hazards/risks to their supervisors • Acknowledge how employees' safety-related contributions positively impact the organization's safety culture

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Next Steps and Contact Information

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Find your local FSDO

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https://www.faa.gov/faa-aviation-safety-outreach

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