1. WHO DOES THIS BULLETIN APPLY TO? This bulletin applies to the principal maintenance and avionics inspectors, partial program managers and their assistants (herein referred to as principal inspectors (PIs)) with certificate management responsibilities for Title 14 of the Code of Federal Regulations (14 CFR) part 121, 125, and 135 certificate holders. It also applies to geographic inspectors and PIs assigned to part 91, subpart K operators.

2. WHAT IS THE PURPOSE OF THIS BULLETIN? This bulletin provides guidance for the PI to follow-up on notification of a smoke/fumes in the cockpit/cabin event. The information entered into Program Tracking and Reporting Subsystem (PTRS) will allow the Federal Aviation Administration (FAA) Flight Standards Safety Analysis Information Center (FSAIC) to analyze and trend these events.

3. WHY IS THIS BULLETIN BEING RELEASED? There have been concerns raised about numerous reports of “smoke/fumes in the cockpit/cabin” events on commercial air carrier/operator aircraft. During the FAA’s analysis of this data, it appears as though there are numerous air carriers/operators who may not have reported these events as required by regulation. Prompted by the Office of the Secretary of Transportation’s recent interest in these events, the FAA is introducing new policy for PIs to follow. This guidance will require PIs to:
• Determine that the air carrier/operator has adequate procedures for reporting, investigating, corrective action and following up these events

• Follow-up on each event from their particular air carrier/operator to determine that their programs are effective

• Make PTRS entries for each of these events so that complete and accurate data is made available for analysis and trending

4. WHAT TYPE OF “SMOKE/FUMES IN THE COCKPIT/CABIN” EVENT IS THE FAA INTERESTED IN FOR THE COLLECTION OF DATA? The guidance applies to all reported events of smoke/fumes in the cockpit/cabin while the aircraft is in operation. This guidance applies whether the reported event was legitimate or erroneous; whether a discrepancy actually existed or the aircraft was returned to service with no faults found. It applies whether the air carrier reported the event or it was reported from another source such as ATC/Comm Center or a Regional Office.

   NOTE: For the purposes of this bulletin the term “in operation” means the period from the moment the aircraft pushes off the gate for flight until it returns to the gate from flight.

5. HOW DO I DETERMINE IF THE AIR CARRIER/OPERATOR HAS ADEQUATE PROCEDURES FOR “SMOKE/FUMES IN THE COCKPIT/CABIN” EVENTS? Air carriers/operators are required by the regulations to provide a system for the Continuous Analysis and Surveillance System (CASS) of their maintenance programs and make corrections to those programs when necessary. There are also specific reporting requirements applicable to these air carriers/operators where events of smoke/fumes in the cockpit/cabin caused by a component must be reported to the FAA within a certain timeframe (ref. §§ 121.703(a)(5), 125.409(a)(4), 135.415(a)(5), and 91.1415(a)(5)). These requirements are essentially the foundation for the policy in this bulletin. Based on these requirements, the air carrier/operator must have the following policy, procedures, and instructions in their manuals:

   NOTE: The requirement for CASS does not apply to operators maintaining their aircraft under the applicability of §135.411(a)(1) or part 125.

   A. The methods to repeatedly identify and report “smoke/fumes in the cockpit/cabin” events and the appropriate controls to ensure the consistent reporting of these events.
B. The requirements for the CASS to investigate each occurrence to determine if any deficiencies exist in the maintenance program. The CASS should also determine if the corrective action taken for the reported event was adequate based on analysis of previous event data (recurring events) and to determine if corrective actions are necessary. If any changes are made to the maintenance program based on CASS analysis then there must be a follow-up (process measurement) in place to ensure the corrective action achieved the desired results.

6. WHAT DO I DO WHEN THE EVENT OCCURS OUTSIDE OF MY GEOGRAPHICAL AREA AND A “GEOGRAPHIC INSPECTOR” CREATES A PTRS? In these situations the PI must still complete the steps below. It is imperative that not only the “geographic inspector” investigate the event but also for the PI to investigate (see par. 7) to ensure the air carrier/operator’s system is producing desired results. In an effort to prevent duplicate data from being analyzed, only the PI will enter in the PTRS National Use field “SMOKE” (without the quotes).

7. WHAT MUST I DO AS A FOLLOW-UP TO EACH OF THE AIR CARRIER/OPERATOR’S REPORTED “SMOKE/FUMES IN THE COCKPIT/CABIN” EVENTS? After each one of these events, the PI must ensure that the air carrier/operator followed policies, procedures, and instructions in accordance with their manuals, if applicable. The PI must also review each of these events and evaluate the corrective action taken by the air carrier/operator. While accomplishing this, the PI should be aware of any adverse trends. The PI must make the required PTRS entry for each of these events so that the FAA can collect this data.

8. WHAT DO I DO WITH EVENTS THAT DO NOT REQUIRE REPORTING BY THE REGULATIONS? The regulatory requirements to report “smoke/fumes in the cockpit/cabin” events only apply to events that are a result of a component failure, malfunction, etc. Reports of smoke/fumes that are not the result of a component/mechanical difficulty or malfunction may or may not be reported under the regulations by the air carrier/operator.

A. An example would be a diversion in flight due to a reported noxious odor in the cabin, which was subsequently unable to be duplicated. The aircraft was returned to service with no failures or malfunctions noted. Because no component failed, or no mechanical difficulty/malfunction occurred, the carrier is not required by regulation to report the event.

B. However, in most cases, ATC/Comm Center reported the event as “smoke/fumes in the cockpit/cabin” and the FAA needs to
collect that data for trend analysis. In these cases, the PI must follow-up with the air carrier as outlined below.

9. WHAT INFORMATION NEEDS TO BE IN THE PTRS ENTRY I USE TO RECORD THE EVENT? After the PI follows up each event a PTRS entry including the following information must be made stating that the follow-up activity has been accomplished. The PI should make any necessary comments in the appropriate fields to notate any negative trends, potential problems, etc. The PTRS should also include the following information. If the information is not placed in a designated PTRS field then the information should be placed in the comments section.

- Date of event
- Time of event
- Aircraft M/M/S
- Flight #
- Originating city and destination city
- Note if the crew declared an emergency
- City flight diverted/returned to (if applicable)
- Note if emergency evacuation occurred
- Discrepancy (ensure this differentiates smoke, fumes, fire, etc.)
- ATA code for the reported event (only two digit code, no subsystem codes are necessary).
- Corrective action or action taken to return aircraft to service (i.e., “R&R’d video monitor” or “could not duplicate”)
- Note air carrier/operator’s action(s) to prevent event from recurring (if applicable)

To ensure accurate data collection, use the applicable PTRS code and enter “SMOKE” (without the quotes) in the National Use field:

- 3720/5720 INVSTG/OCCURRENCE
- 3702/5702 INVSTG/ACCIDENT ON SITE
- 3703/5703 INVSTG/ACCIDENT OTHER
- 3711/5711 INVSTG/INCIDENT ON SITE
- 3712/5712 INVSTG/INCIDENT OTHER

10. HOW DO I ENTER IN THE EVENT IF I AM ASSIGNED TO AN AIR CARRIER UNDER ATOS? PIs for ATOS air carriers should follow the guidance contained in paragraph 9 above.

11. WITH THIS NEW GUIDANCE DO I STILL HAVE TO DO THE BRIEFING PAPERS TO THE REGION ON EACH EVENT OF “SMOKE/FUMES IN THE COCKPIT/CABIN?” No, after the effective date of this bulletin, PIs are no longer required to complete a briefing paper on these events unless specifically requested from FAA Headquarters or Regional Offices and only on a case-by-case basis.
12. WHO DEVELOPED THIS GUIDANCE? The Air Carrier Maintenance Branch, AFS-330, developed this bulletin. You should direct inquiries regarding the guidance in this bulletin to Jeff Slaughter, AFS-330, at (202) 267-8734.

13. WILL THIS BULLETIN EXPIRE? This bulletin will expire 1 year from the effective date.

ORIGINAL SIGNED BY
Ferrin Moore for

David E. Cann, Manager
Aircraft Maintenance Division