

Turbofan Engine Malfunction Recognition and Response

The attached materials were developed to assist flight crews in understanding the operation and typical malfunctions of turbofan engines. As this information was designed to apply to a generic turbofan engine, it can be used to develop new instructional material when upgrading from turboprop to jet operations, or to enhance current flight crew training and operational understanding.

Background

In November, 1998, the Propulsion System Malfunction Plus Inappropriate Crew Response (PSM+ICR) Working Group issued its final report, entitled "AIA/AECMA Project Report on PSM+ICR." This report concluded that, "Although the vast majority of propulsion system malfunctions are recognized and handled appropriately, there is sufficient evidence to suggest that many pilots have difficulty identifying certain propulsion system malfunctions and reacting appropriately." The report further concluded that training material on the subject of modern propulsion system malfunction recognition should be improved and made available to flight crews.

One of the report's recommendations was, "The aviation industry should undertake as a matter of high priority the development of basic generic text and video training material on turboprop and turbofan propulsion system malfunctions, recognition, procedures, and airplane effects." To address this recommendation, the Turbofan Engine Malfunction Recognition and Response Working Group was jointly sponsored by the Air Transport Association (ATA) and the Flight Standards division (AFS) of the Federal Aviation Administration (FAA) to develop training aids for generic engine malfunction recognition.

The developed package contains:

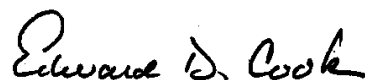
- The 22-minute VHS video entitled, "Turbofan Engine Malfunction Recognition and Response"
- Textual training material entitled, "Airplane Turbofan Engine Operation and Malfunctions - Basic Familiarization for Flight Crews"
- A CD-ROM containing both the video and text material.

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James K. McKie
Director, Operations
Air Transport Association



Edward D. Cook
Supervisor, Project Development Section
National Simulator Program
FAA Flight Standards