



SUBJ: Engine Fuel - NATO Grade F-24 Jet Fuel

This is information only. Recommendations aren't mandatory.

Introduction

This Special Airworthiness Information Bulletin (SAIB) advises aircraft operators, fixed base operators, FAA repair stations, flight standards district offices, and foreign civil aviation authorities that **NATO grade F-24 jet fuel, as specified in NATO Standard AFLP-3747, "Guide Specifications (Minimum Quality Standards) for Aviation Turbine Fuels (F-24, F-27, F-34, F-35, F-37, F-40, and F-44)," Edition A, Version 1**, is acceptable for use on aircraft and engines certificated for operation with ASTM International D1655 grade Jet A fuel¹, provided the fuel system icing inhibitor (FSII) concentration in the specific batch of F-24 fuel meets the aircraft's operating limitations pertaining to FSII. Grade F-24 jet fuel meets all the performance requirements of D1655 grade Jet A fuel, but specifies a different FSII concentration range as compared to ASTM International D1655 grade Jet A fuel.

Background

FAA approved aviation fuel operating limitations may be listed in the product's aircraft flight manual, type certificate data sheet (TCDS), installation manual, service instructions or manuals, or as limitations associated with a supplemental type certificate. Typically, jet fuel operating limitations either directly specify ASTM International specification D1655, or specify other documents that refer to that specification.

Grade F-24 jet fuel was established by the U.S. military to facilitate the use of commercially available grade Jet A fuel by military aircraft when operating in the continental United States. NATO Standard AFLP-3747 defines grade F-24 jet fuel as kerosene type turbine fuel conforming to ASTM D1655 that contains FSII, lubricity improving additive, and static dissipater additive. AFLP-3747 specifies a concentration of FSII that differs from the allowable concentration range specified in ASTM International D1655. The requirements for the other two additives are identical to ASTM International D1655.

The FAA has determined that NATO grade F-24 jet fuel meets the performance requirements of ASTM International D1655 grade Jet A fuel. We have also determined that performance will be identical in existing aircraft and engines that are approved to operate on D1655 grade Jet A fuel¹, provided the FSII concentration in the specific batch of F-24 fuel meets the aircraft's operating limitations pertaining to FSII.

Recommendations

Because NATO grade F-24 jet fuel meets the requirements of ASTM specification D1655¹, the following recommendations apply:

¹ Or grade Jet A fuel defined by other documents such as company specifications or service bulletins that refer to ASTM International D1655 grade Jet A fuel.

1. Grade F-24 jet fuel is acceptable for use on those aircraft and engines that are approved to operate with ASTM International D1655 grade Jet A fuel¹, provided the FSII concentration in the specific batch of F-24 fuel meets the aircraft's operating limitations pertaining to FSII.
2. Grade F-24 jet fuel is not acceptable for use on those aircraft or engines that prohibit the use of jet fuel containing FSII.
3. Grade F-24 jet fuel complies with operating limitations in aircraft flight manuals, pilot operating instructions, or TCDSs that specify ASTM International D1655 grade Jet A fuel¹, provided the FSII concentration in the specific batch of F-24 fuel meets the aircraft's operating limitations pertaining to FSII.
4. Grade F-24 jet fuel complies with aircraft placards that specify ASTM International D1655 grade Jet A fuel¹, provided the FSII concentration in the specific batch of F-24 fuel meets the aircraft's operating limitations pertaining to FSII.
5. Operating, maintenance, or other service documents, for aircraft and engines that are approved to operate with ASTM International D1655 grade Jet A fuel¹, are acceptable for use with NATO grade F-24 jet fuel provided the FSII concentration in the specific batch of F-24 fuel meets the aircraft's operating limitations pertaining to FSII. (No revision to these documents is required to operate with conforming F-24 fuel.)
6. Release of super absorbent polymer filter particles into jet fuel supplied to aircraft has been found to occur when ground-based filter monitors are exposed to fuel containing FSII. Therefore, ground-based filter monitors should not be exposed to grade F-24 jet fuel. In addition, F-24 jet fuel that has been de-fueled from aircraft should be kept segregated from the airport fuel supply to prevent exposure of airport filter monitors to fuel containing FSII.

For Further Information Contact

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