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General Guidelines & Precautions for Fuel Nozzle Overhaul

For Warranty Policy & Model Eligibility, Please visit us at www.hyetechllc.com

Subject: Inspection & rework procedures for 47070HT Fuel Nozzle Body & 47089HT Fuel Nozzle Outer Shroud.

Compliance: Any time during repair or overhaul when the fuel nozzle is disassembled.

Notes: Standard shop practices may be substituted for materials and procedures referenced herein provided they have been demonstrated as effective and safe for use with these parts or their OEM and other FAA approved equivalents. Refer to OEM's published data for disassembly, cleaning, assembly, installation, testing & engine operation.

Always conduct flow calibration prior to repair and/or overhaul & note any possible discrepancies prior to disassembly.

(1) Disassembly

Remove lockwire between the outer shroud & body. Place the nozzle into fixture 6897875 or equivalent to separate the shroud from the body. Remove the filter **(refer to FAA AD 2006-16-04)** & inner shroud assembly from the body & outer shroud. Refer to OEM overhaul manual for disassembly, cleaning & inspection of the inner shroud assembly.

(2) Cleaning

Clean the fuel nozzle body & outer shroud ultrasonically using Kelite (No. 235), or a solution of 75% carbon solvent & 25% petroleum solvent (MIL-PRF-7024 Type II). External carbon may be removed by wire brushing and/or grit blasting while protecting the threads & wear surface of the shroud.

After cleaning, flush parts with clean fuel, acetone, methyl ethyl ketone (M.E.K.) or equivalent & ensure that all passages & orifices are free of contaminants from cleaning solutions.

Blow dry parts with dry, filtered compressed air.

Ensure that all parts are free of any moisture. All parts must be properly protected prior to storage.

(3) Inspection & Repair

Fuel Nozzle Body 47070HT

The contact surfaces between the inner air shroud & body have a 32 microinch surface finish, squared edges & should be flat & parallel within .001 in. TIR. Use caution not to damage these areas throughout the overhaul/repair process. Inspect entire body for excessive corrosion paying particular attention to all threads. Replace body if more than one thread (in each area) is corroded.

Inspect	Service Limit	Repair Instruction
All threads	Maximum of one damaged thread.	Chase threads as necessary.
37º Flare	No wear, chips or burrs allowed	Restore per Figure 2
Hex for damage & size	Minor tool marks allowed	Restore per Figure 1

FIGURE 1

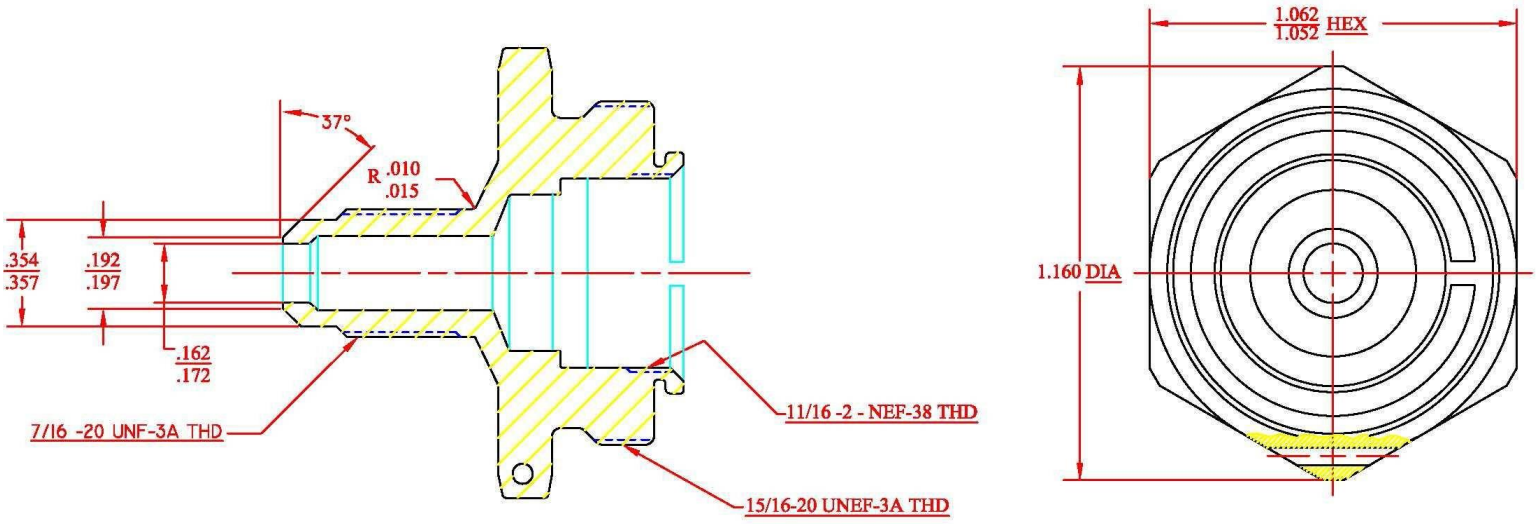
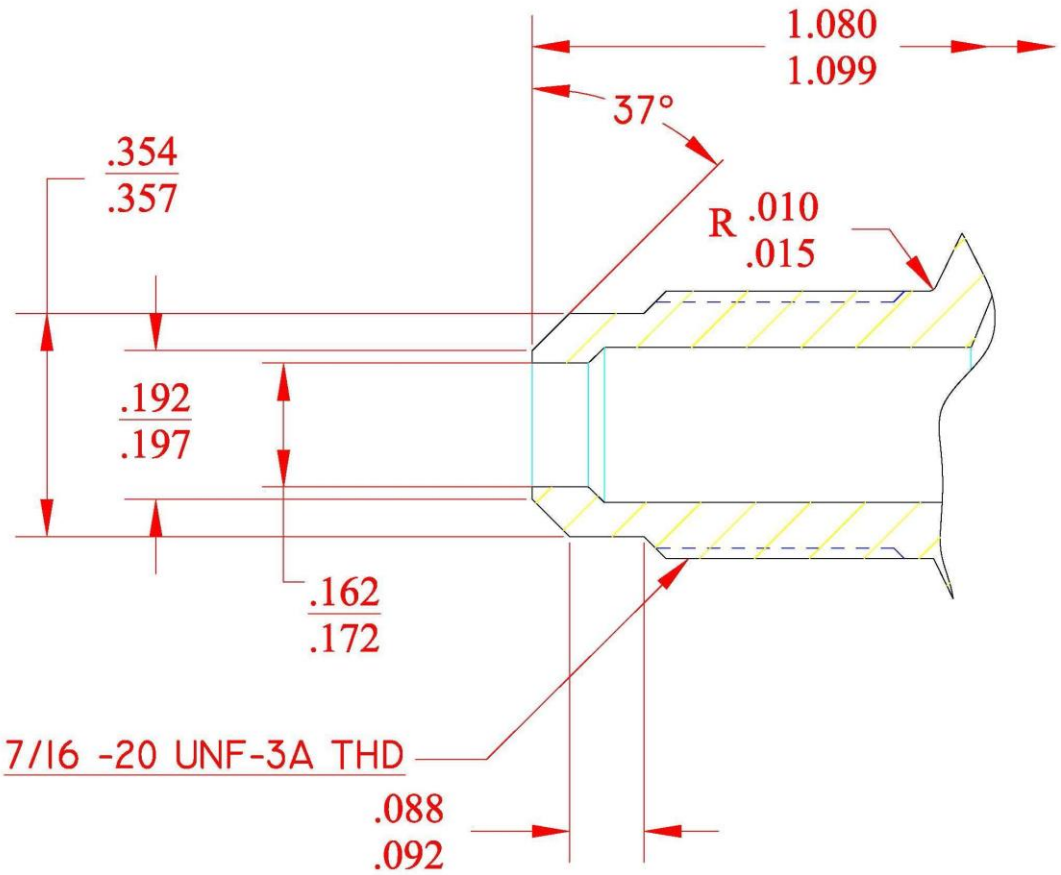


FIGURE 2

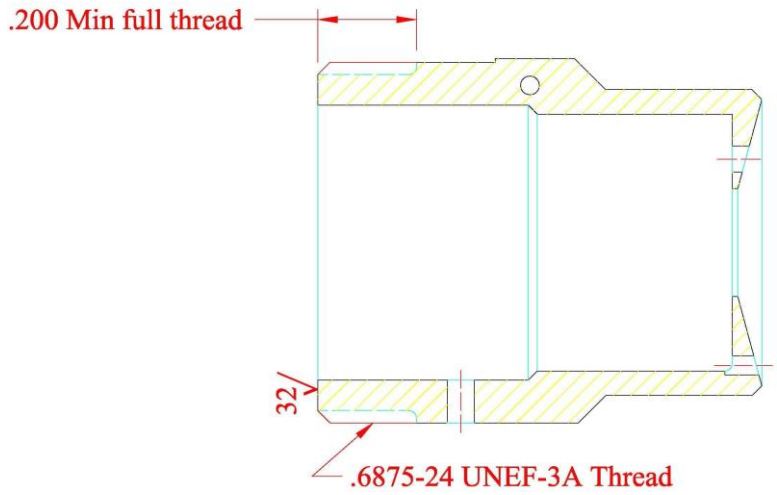
The following dimensions are for general inspection & repair reference.

The 37º flare must fit & align with the mating surface of the firewall to fuel nozzle hose to the degree that both ends shall be uniformly seated in a free state. This fit shall be without distortion or streaching of the tube assembly & to the degree that the nut can be fully engaged up to the final one-half turn with light finger pressure.



Inspect	Service Limit	Repair Instruction
Outer nitrided portion	.620 - .625 O.D.	Replace part
Front face hole pattern & center orifice for warpage, erosion and/or cracks	None	Replace part
Shroud threads for damage and/or corrosion	No more than one damaged or imperfect thread	Chase threads as necessary (Refer to Figure 3)

FIGURE 3



(4) Assembly & Testing

Refer to the OEM instructions for assembly of the inner air shroud assembly.

a. Place nozzle body in the 6897875 or equivalent fixture. Install the filter & inner air shroud assembly into the body. Ensure that the hex on the sleeve is inserted correctly into the filter.

b. Place the outer air shroud over the inner air shroud assembly & thread it into the outer air shroud by hand ensuring that the inner shroud orifice is centered with the outer air shroud center orifice. Tighten to 25 – 30 lb ft.

c. Flow calibrate Fuel Nozzle in accordance with OEM testing procedures.

d. After satisfactory flow calibration, lockwire outer air shroud with body.