

KI-193-4 R22 Gascolator Assembly Upgrade Kit Instructions (for compliance with R22 Service Bulletin SB-99)

KI-193-4 KIT CONTENTS

- 1 ea KI-193-4 INSTR Kit Instructions
- 1 ea KI-193-3 Top Assembly

KI-193-3 TOP ASSEMBLY CONTENTS

- 1 ea B402-3 Top
- 1 ea B416-1 Collar
- 1 ea B416-2 Ring
- 1 ea MS27769D2 Plug
- 1 ea 10536-1 Gasket
- 1 ea 10543-2 Screen

Consumables required

B270-6 sealant & lubricant, thread (Tite Seal 55, ref R22 Maintenance Manual [MM] Section 1.480)

Preliminary Instructions

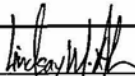
1. Verify kit contents match above list. Contact RHC Customer Service if parts are missing or damaged.
2. Review instructions before installation. Contact RHC Technical Support if you have questions.

Instructions

1. Turn master switch and fuel shut-off valve OFF, remove left side skirts, and drain gascolator.
2. Clean exterior of A666-1 gascolator assembly, attached fittings, A726-1 line assembly, and B283-2 (O-320 engine) or B283-6 (O-360 engine) hose assembly.
3. Refer to R22 Illustrated Parts Catalog (IPC) Figures 12-1 and 12-3B dated NOV 2008 (or subsequent) and Figure 12.13 (primer-equipped R22s only) dated JUN 2006 (or subsequent). Disconnect A726-1 line assembly from gascolator inlet elbow.
4. Disconnect B283 hose assembly from gascolator outlet fitting and protect hose inlet. If installed, disconnect primer line from AN894D4-2 bushing on gascolator outlet tee and protect line inlet.
5. Remove and retain nut and washer from A455-1 plug and remove gascolator. Protect outlet of A726-1 line assembly.

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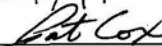
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R22 Gascolator Assembly Upgrade

Revision Rev A

Approved



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Instructions (continued)

6. Remove sediment bowl, A455-1 plug, MS20822-6D elbow, and AN816-6D nipple or tee fitting with attached bushings (primer-equipped R22s only) from gascolator assembly and clean. Discard gascolator top, gasket, and screen.
7. Apply B270-6 sealant sparingly to tapered pipe threads of A455-1 plug, elbow, and nipple or tee (do not apply sealant to first thread of fittings). Install elbow in port marked "IN" on new B402-3 top, torque to 230 in.-lb, then tighten elbow until elbow inlet points up. Install A455-1 plug in center hole of B402-3 top and special torque to 120 in.-lb. Install nipple or tee (primer-equipped R22s only) in outlet port of B402-3 top; torque nipple to 170 in.-lb or torque tee to 85 in.-lb then tighten tee as required until attached bushings point down. Wipe off excess sealant.
8. Place B402-3 top in A454-1 support and finger-tighten A726-1 line assembly to elbow. Install washer and nut on A455-1 plug, special torque nut to 70 in.-lb, and torque stripe per MM Figure 2-1. Special torque nut on A726-1 line assembly to 285 in.-lb and torque stripe per MM Figure 2-1.
9. Connect primer line, if installed, to bushing on gascolator outlet tee, special torque nut to 25 in.-lb, and torque stripe per MM Figure 2-1. Connect B283 hose assembly to gascolator outlet fitting, special torque nut to 120 in.-lb, and torque stripe per MM Figure 2-1.
10. Remove B416-1 collar and B416-2 ring from B402-3 top (ring is pre-lubricated with A257-6 grease and may stick to collar inner flange). Verify large diameter of ring is contacting inner flange of collar. Slide combined ring and collar over bottom of sediment bowl so small diameter of ring engages groove in underside of bowl flange. Verify new screen and gasket installed in B402-3 top. With sediment bowl drain positioned thru cut-away in belly, hand-tighten collar, ring, and bowl onto B402-3 top until snug. Safety collar to outlet fitting using 0.032-inch diameter lockwire.

NOTE

As required, lightly lubricate collar threads and surface contacting ring with A257-6 grease during subsequent screen and sediment bowl inspections.

11. Verify drain valve on sediment bowl is torque striped per MM Figure 2-1. As required, special torque drain valve to 60 in.-lb wet with B270-6 sealant and torque stripe per MM Figure 2-1.
12. Defuel helicopter per MM Section 1.150 until LOW FUEL light illuminates.
13. Perform fuel flow check per MM Section 12.260.
14. Connect fuel hose to carburetor inlet, special torque to 120 in.-lb, and torque stripe per MM Figure 2-1.

Instructions (continued)

15. Turn fuel shut-off valve ON. Verify no fuel leaks.
16. Install left side skirts. As required, secure optional cabin heater motor, duct, and wiring.
17. Have qualified person run-up and shutdown helicopter per Pilot's Operating Handbook.
18. Verify no fuel leaks.
19. Make appropriate maintenance record entries (no change in weight and balance).