

SECTION 2

INSPECTION, COMPONENT OVERHAUL,
AND MANDATORY REPLACEMENT SCHEDULES

2-1. GENERAL INFORMATION.

2-2. AIRWORTHINESS CHECK. Table B-1 references the Pilot's Flight Manual for the Airworthiness Check; that shall be accomplished prior to the first flight of each day.

2-3. PERIODIC INSPECTION REQUIREMENTS. Table B-2 lists the periodic inspection requirements for the Model 269C-1 Helicopter. Separate inspection requirements are listed for each inspection interval. All periodic inspections listed are considered to be mandatory by Sikorsky Aircraft Corporation, and must be accomplished at the interval specified.

NOTE

Perform periodic and special inspections of the starter, engine, and magnetos in accordance with the appropriate vendor publications. (Basic HMI, Table 2-7).

Where operating conditions and situations warrant, perform periodic inspections at more frequent intervals than those specified in Table B-2. (For example, when helicopter is operated for extended periods of time at temperatures of 32°F or below, inspect the main and tail rotor transmissions for water condensation and accumulation, more frequently than the 100-hour interval.)

2-4. SPECIAL INSPECTIONS. Table B-3 lists inspections which are contingent upon unusual events (e.g. hard landing, rotor blade strike/sudden stoppage of drive system, etc.) that might occur. Also listed in Table B-3 are inspections that are to be accomplished at times other than those specified in Table B-2. The inspections listed in this section must be accomplished when and if the specified event occurs, to verify that the helicopter is airworthy.

NOTE

Flag notes indicated on Tables B-4 and B-5 are located directly after the respective tables.

2-5. COMPONENT OVERHAUL SCHEDULE. Table B-4 is the Component Overhaul Schedule for Model 269C-1 Helicopters. The actual instructions required to accomplish component overhaul are provided within the appropriate sections of the HMI. Component overhaul at the time intervals specified within Table B-4 is considered to be mandatory by Sikorsky Aircraft Corporation and must be accomplished in order to maintain the helicopter in airworthy condition. Record in the Component Record of the Helicopter Log Book, the total time of the component overhauled, the aircraft total time, and the total time of the component when it is due to be overhauled again. The part may be returned to zero total time since overhaul after completion of overhaul.

NOTE

Alpha and/or numeric suffixes added to part numbers denote special manufacturing or handling procedures and do not alter the overhaul requirements of the part. For example, 269A5305-11 and 269A5305-11M2 are subject to the same requirements.

2-6. MANDATORY REPLACEMENT SCHEDULE. Table B-5 is the Mandatory Replacement Schedule for limited-life components. The components listed in Table B-5 shall be removed from the helicopter and permanently retired from service upon reaching their maximum service life. For example, a part with maximum service life of 1000 hours may accumulate 1000 hours of time in service. Upon the accumulation of 1000 hours of time in service, the part shall be removed and permanently retired from service. Retired parts should be destroyed (or conspicuously marked) to prevent inadvertent return to service.

Table B-2. PERIODIC INSPECTIONS**What to Inspect - 100-hour Inspection****NOTE**

Perform a complete Airworthiness Check, 25, 50-Hour and any required Special Inspections as part of the 100-Hour Inspection listed below.

INITIALS

1. All exterior and interior structure for damage and condition.
2. All engine and electrical wiring and systems for security, broken insulation and wires, fraying, corrosion, evidence of arcing and damage.
3. Pitot tube connection and tube assembly for condition, security, and free of obstructions. Drain hole clear.
4. VHF antenna for condition and security.
5. Lower forward (3-piece) fairing and air induction system for condition, security and obstructions. Alternate air (bypass) door for cleanliness, obstruction and freedom of movement.
6. Inspect induction air filter; replace if necessary (Basic HMI, Section 2).
7. Canopy slat for obvious damage and cracks; slat attachment hardware and canopy attachment areas for condition and security.
8. OAT sunshield for obstructions, condition and security.
9. Canopy and front exterior for obvious damage; windshields for condition and cleanliness. Canopy attachment areas for condition and security.
10. Entire fuselage frame section and support struts for structural integrity of tubes, visible openings, cracked welds and evidence of local corrosion.
11. Using a 10X magnifying glass, visually inspect the left and right aft cluster fittings for cracks, corrosion or other damage. Pay particular attention to the tailboom support strut attachment lugs, cluster fitting flanges, and frame tube to fitting joints. Dye penetrant inspect if cracking is suspected. If cracked or distorted, replace cluster fitting prior to next flight. If corrosion is found on cluster fitting, remove corrosion and inspect according to Basic HMI, Section 13.
12. Fuel tank straps for security, tank for correct fuel level and filler cap secured. Drain small amount of fuel from tank sump; check for water or other foreign matter. Visually inspect fuel tank vent tube for obstructions and fuel quantity sender and sender wires for condition.
13. (Power ON Inspections) Turn BAT switch to ON position, and check the following:
 - (a) Exterior lighting (position/tail/strobe lights) and landing light for proper operation; switches OFF after check.
 - (b) Interior lighting (panel lights) and communication equipment for proper operation; all switches OFF after check.

Table B-2. PERIODIC INSPECTIONS**What to Inspect - 100-hour Inspection (cont)**

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30. Forward and aft landing gear dampers (LH side and RH side) for operation and condition, and for damper extension with full fuel tank (Basic HMI, Section 12). Visually check dampers for leakage; replace if leakage is obvious or extension is not within limits (Basic HMI, Section 12).
 31. Landing gear stabilizers for security and obvious damage.
 32. Drag struts for condition, security, and straightness.
 33. Landing skids and shoes for obvious damage and security. With assistance, rock helicopter back and inspect bottom of skid tube for wear.
 34. Forward and rear skid struts for security and obvious damage; aft struts for freedom of swivel joints.
 35. Aft crossbeam for damage, security and excessive bending (One inch maximum allowed with no weight on gear, Basic HMI, Section 12).
 36. Front crossbeam for security and obvious damage.
 37. Landing light and wires for condition and security.
 38. Exterior of tailboom for obvious damage.
 39. Without disassembly, inspect tailboom assembly strut fittings and tailboom saddle for cracks, corrosion or other damage. Tailboom struts and end fittings for condition and security. Check condition of sealant where fittings enter tube and reseal if required.
 40. Visually inspect center attachment fitting for cracks or damage; pay particular attention to rivets securing center attachment fitting to tailboom; check for evidence of black fretting products under fitting rivet heads, or cracking in support fitting. Also check for cracking around attach rivets and screws of center bulkhead, tail rotor damper assembly and open holes in tailboom. Inspect attachment fittings for cracked lugs securing to tailboom struts. Dye penetrant inspect lugs of center attachment fitting if cracking is suspected.
 41. Position/tail/strobe light unit and wires for security and obvious damage.
 42. Static system for blockage. Clear obstruction from static system (Basic HMI, Section 14).
 43. Vertical stabilizer for damage and security.
 44. Tail rotor transmission adapter bolts for security.
 45. Horizontal stabilizer for condition and security. Check for cracks in all attachment mounts and castings, skins and rear spar close out; corrosion, loose rivets and other damage.
 46. Perform 100 hour engine inspection in accordance with manufactures publications.
 47. If installed, inspect engine overspeed installation (269A4997-1). Check magnetic pick-up, wiring, and control box for damage and security; perform operational check.
 48. If installed, check exhaust diffuser for damage, carbon build-up, and loose or missing parts.

INITIALS