**Q Annual Inspection / Condition Inspection**

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| **Reg#** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | **Model** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
| **S.N.** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | **Builder** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
| **Tach hrs.** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | **Date** | Start \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_  Finished \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
| **Performed by** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | **Certificate** | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |

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| **ENGINE** | Checked | Completed |
| Warm engine to operating temperature. (Go fly) |  |  |
| Remove cowling and inspect for chafing and stains. |  |  |
| Clean & inspect cowling and fasteners |  |  |
| Check air intake screen. |  |  |
| Check for evidence of oil leaks and fuel leaks. |  |  |
| Drain oil. (Take oil sample). |  |  |
| Compression test: #1 cylinder |  |  |
| #2 cylinder |  |  |
| #3 cylinder |  |  |
| #4 cylinder |  |  |
| Clean, inspect, and re-gap spark plugs. |  |  |
| Check ignition timing. (For reference). |  |  |
| Check plug wires condition. |  |  |
| Rotate and reinstall top spark plugs. |  |  |
| Pull engine forward to access rear of engine. |  |  |
| Check mag points and lube cam. |  |  |
| Check distributor, points, and rotor & lubricate. |  |  |
| Adjust timing if needed. |  |  |
| Check magneto cooling hoses. |  |  |
| Check oil screen, replace gasket, and re-safety. |  |  |
| Check electrical connections; starter, gen., voltage reg., etc. |  |  |
| Remove gen. & starter covers, check brushes and commutator. |  |  |
| Check all nuts & bolts for torque on accessory case. |  |  |
| Check engine mounts, rubber, and bolts. |  |  |
| Reinstall engine, hook everything up. |  |  |
| Install lower plugs. |  |  |
| Replace oil. (Install new drain plug gasket & safety). |  |  |
| Check fuel strainer & safety. |  |  |
| Drain Carburetor bowl & clean carb. inlet screen. |  |  |
| Remove heat muffs. |  |  |
| Check exhaust system for cracks and leaks. |  |  |
| Reinstall muffs. |  |  |
| Check all hose connections and clamps. |  |  |
| Check all fuel & oil hoses for leaks, security, chafing. |  |  |
| Check rocker box covers, valve springs, and rocker arms. |  |  |
| Spot check cylinder base nuts. |  |  |
| Check push rod housings, seals & clamps. |  |  |
| Check intake manifolds for leaks. (look for fuel stains). |  |  |
| Check inter-cylinder & head baffles. |  |  |
| Check carb heat valve. |  |  |
| Remove & inspect spinner for wear and/or cracks. Inspect propeller. |  |  |
| Re-torque prop bolts, check tracking, & re-safety. |  |  |
| Wash engine with approved solvent. |  |  |
| Inspect controls for full range of movement. |  |  |
| Lube engine controls. |  |  |
| Run up & check for leaks. |  |  |
| Replace cowling & run visual check. |  |  |
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| **FUSELAGE** | Checked | Completed |
| Check exterior for cracks or delaminations. |  |  |
| Remove upholstery. |  |  |
| Thoroughly clean interior. Note stains or leaks. |  |  |
| Check internal integrity of fuselage wall and bulkheads. |  |  |
| Check control cables, tubes, brackets, etc. aft section. |  |  |
| Check aileron bellcranks & lube. |  |  |
| Check aileron mass balance weights. |  |  |
| Check tail cone attach brackets and bolts. |  |  |
| Check reflexor and lube. |  |  |
| Check battery cables and solenoid for corrosion and security. |  |  |
| Service battery as required. |  |  |
| Check battery box for security and venting. |  |  |
| Check for fuel leaks inside cabin. Clean/replace filter. |  |  |
| Drain fuel sumps. |  |  |
| Check fuel primer. |  |  |
| Check fuel gauges for condition and operation. |  |  |
| Check speed brake pivots, hinge, and latching. |  |  |
| Check control stick for movement, wear, and cracks. |  |  |
| Check canopy latch system. |  |  |
| Check safety belt harness for security and condition. |  |  |
| Check wiring, lines, and controls behind instrument panel. |  |  |
| Check elevator trim system. |  |  |
| Check instruments and vacuum system for condition and leaks. |  |  |
| Check electrical system. |  |  |
| Check interior lighting. |  |  |
| Check instrument panel for general condition and security. |  |  |
| Check instruments for proper marking and illumination. |  |  |
| Check fuel filler cap and door. |  |  |
| Check fuel tank decals for condition, octane, and capacity. |  |  |
| Check Aux fuel tank, lines, pump & filler cap. |  |  |
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| **WINGS** | Checked | Completed |
| Check general condition, cracks, or delaminations. |  |  |
| Check controls and bellcranks, nuts and bolts. |  |  |
| Check elevators pivots for wear. Lube. |  |  |
| Check elevators for security. |  |  |
| Check aileron pivots for wear. Lube. |  |  |
| Check ailerons for security. |  |  |
| Check electrical wiring. |  |  |
| Check position lights. |  |  |
| Check anti-collision lights. |  |  |
| Check landing light. |  |  |
| Check condition of main wheels and tires. |  |  |
| Check brake pucks. |  |  |
| Check brake rotors and calipers. |  |  |
| Check axle and axle hard points. |  |  |
| Check wheel bearings. |  |  |
| Fill master cylinder. |  |  |
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| **TAIL ASSEMBLY** | Checked | Completed |
| Check tail cone for general condition, cracks, delams. |  |  |
| Check tail wheel spring. |  |  |
| Check tail wheel, bearings, swivel, and tail wheel bracket. |  |  |
| Check tail wheel bolts and lube. |  |  |
| Check rudder pivot points for wear and lube. |  |  |
| Check rudder horn. |  |  |
| Check all rudder cables for wear and adjustment. |  |  |
| Check rudder cable pulleys for wear, movement, alignment. |  |  |
| Check rudder pedals for security. |  |  |
| Check position light. |  |  |
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| **MISCELLANEOUS** | Checked | Completed |
| Data Plate. |  |  |
| Airworthiness Certificate. |  |  |
| Operating Limitations. |  |  |
| Weight and Balance data. |  |  |
| State registration. |  |  |
| Passenger warning and Experimental placard. |  |  |
| Passenger Sic Sacs. |  |  |
| NASA incident reporting form. |  |  |
| Transponder due date. |  |  |
| Altimeter due date (If IFR). |  |  |
| Static system due date (If IFR). |  |  |
| E.L.T. battery replacement date. |  |  |
| E.L.T. check (Within 5 minutes past the hour). |  |  |
| Fire extinguisher. |  |  |
| Functional ground check of radio. |  |  |
| Fill out logbooks. |  |  |
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Revised: 2019