



(5) **FUEL SHUT-OFF VALVESWITCHES.** - Solenoid valves, operated by four toggle switches permit immediate shut-off of the fuel at the tank when necessary. Failure of electrical power causes the valves to "OPEN" allowing fuel to flow.

(6) **IDENTIFICATION LIGHTS.** - Two switches and a keying button permit signalling with any combination of the four lights.

(7) **PROPELLER FEATHERING SWITCHES.**

(a) Each propeller is feathered individually by one of the four red push button switches above the central control panel on the instrument panel. Pushing the switch in starts an electric pump in the nacelle which supplies hydraulic power for the feathering operation. When the propeller is fully feathered the pushbutton automatically releases, stopping the pump. To stop the operation before feathering is complete, pull out the switch button by hand.

(b) To unfeather a propeller, the push-button switch must be manually held in the closed position until unfeathering has been accomplished.

NOTE

When unfeathering a propeller on a cold engine, do not allow the engine speed to exceed minimum governing speed until oil pressure and oil temperature appear satisfactory. Turn off the ignition after feathering any propeller if the engine is to remain inoperative for any length of time. Do not operate more than one propeller feathering switch at a time, except in emergencies.

(8) **TURBOSUPERCHARGER CONTROLS.** - The supercharger regulators are operated by engine oil pressure. With warm oil in the engine the minimum time for operating the regulator control from the low boost to the high boost position should be 5 seconds. If the oil is somewhat cooler than normal engine temperatures, this should be extended to 15 seconds.

b. COPILOT'S AUXILIARY PANEL.

(1) **CARBURETOR AIR FILTER CONTROLS.**

(a) Carburetor air filter valve motors are controlled by one double-throw toggle switch located on the side of the auxiliary panel, forward of the copilot. When all the valves are "ON" permitting only filtered air to enter the supercharger intakes, four amber lamps are lighted. Four green lamps light when the control valves are "OFF," admitting only unfiltered air to the supercharger intakes. Any lamp failing to light indicates that the corresponding valve has not completed its travel to the full open or full closed position.

(b) Air filters should be "ON" for all ground operations and for dust conditions up to 8000 feet.

(c) Use of the filters above 8000 feet should be avoided, since operation above that altitude is accompanied by a rise in carburetor air inlet temperature, increasing the possibility of detonation. (This condition is aggravated by abnormally high outside air temperatures.) The turbo also has a tendency to overspeed. **IN ALL CASES, THE FILTERS MUST BE CLOSED ABOVE 15,000 FEET!** Failure to ob-