



This Service Letter is Approved

This Service Letter reidentified as  
Service Bulletin M 20-123  
per Service Instruction M20-15.

SUBJECT: Induction System Air Valve

MODEL AFFECTED: M20E S/N 101 - 604

TIME OF COMPLIANCE: At the next 100 hour inspection

**INTRODUCTION:**

It will be necessary for the owners of the above mentioned aircraft to replace the operating mechanism for the alternate air valve located at the rear of the induction air box.

**INSTRUCTIONS:**

1. Remove the induction air filter.
2. Remove either the right or left side cowl.
3. Going through the opening left after removal of the filter, remove the cotter pin in the AN 4-24 bolt.
4. Holding the 600118-15 door to prevent its turning, remove the AN 4-24 bolt.
5. Remove the 600118-19 doubler by drilling out the rivets securing it.
6. Put the 600118-39 doubler assy. in the position of the previously removed 600118-19 doubler.
7. Rivet the 600118-39 doubler assy. to the 600118-33 box with AN 426 AD3 rivets, with the countersunk head to the inside of the -33 box. (typ. 12 places)
8. Install the 600127-19 sleeve in the hole in the 600118-39 doubler assy.
9. Take the AN 4-23 bolt and assemble the AN960-416 washer, Nylomatic N5389 bearings (2), and the Lee LC-047F-7 spring as shown in Figure 1.
10. Install the bolt assembly through the sleeve in the 600118-39 doubler assy.
11. Holding the 600118-15 door and the 600118-25 seal in place to prevent them from turning, tighten the bolt assembly until a preload of a minimum of 3.0 lbs. or 4.0 lbs. maximum is reached on the spring.
12. To check the preload, install a ring of wire through the cotter pin hole in the bolt, the door should begin to open between 3.0 and 4.0 lbs., adjust the bolt until the preload is reached. Remove the wire ring from the bolt.
13. Install the AN 381-2-8 cotter pin thru the AN 4-23 bolt.
14. Reinstall the side cowl.
15. Reinstall the induction air filter.

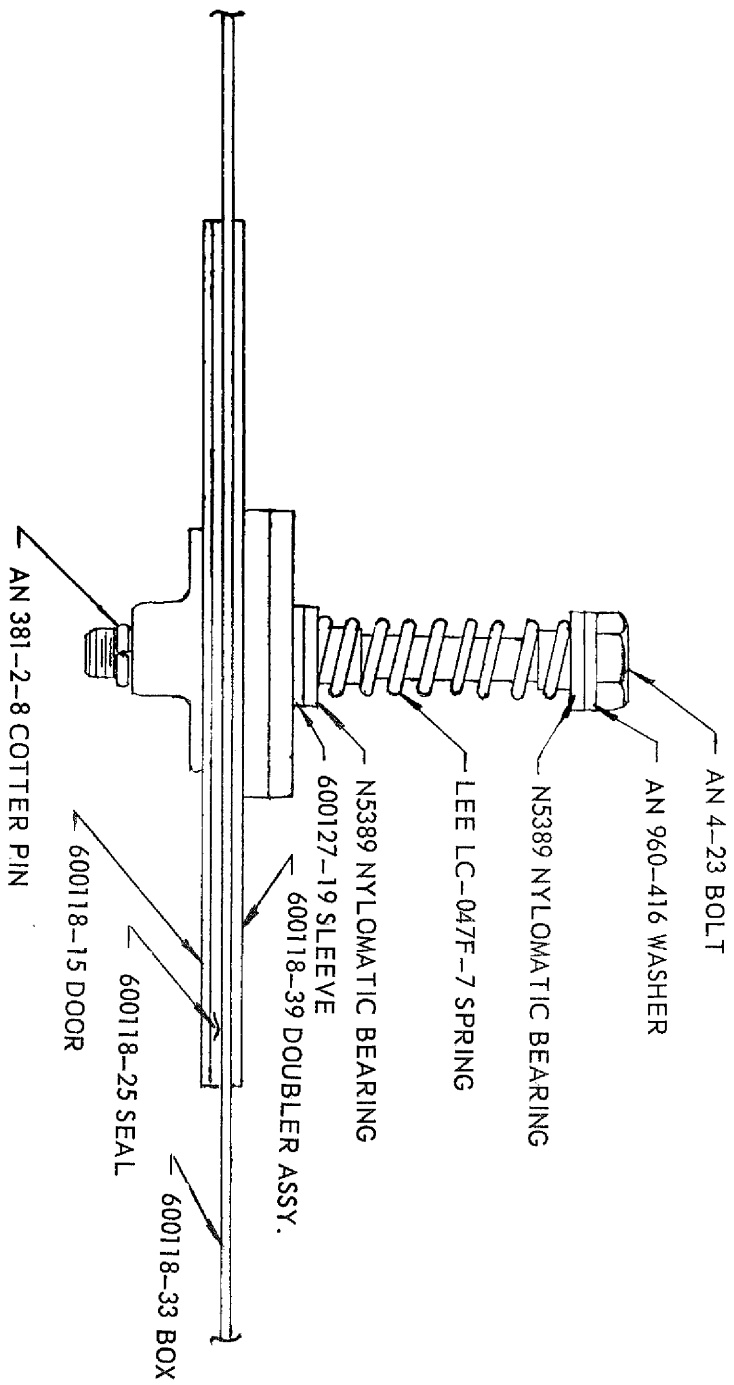
**COMPLIANCE:**

Upon compliance of this Service Letter, please fill out the enclosed compliance card and return it to Mooney Aircraft, Inc. for our files.

**S. L. KIT 20-****PARTS LIST**

600118-39	Doubler Assy.	1
600127-19	Sleeve	1
N5389	Nylomatic Bearing	2
LC-047F-7	Lee Spring	1
AN 4-23	Bolt	1
AN 960-416	Washer	1
AN 381-2-8	Cotter Pin	1
AN 426 AD3	Rivets	15

This kit may be obtained from your local Mooney distributor. Direct factory orders will not be accepted.



**FIGURE 1**