Install A Hi-Po Manual Choke

Hi-Po Manual Choke Conversion Kits from Mustangs, Etc.

Text and photography by Jim Smart



Confound it the frustrations associated with automatic chokes. They either don't choke enough and the darned thing stalls when it's cold or they choke too much and it is fouled spark plugs and sooty exhaust. If only you had more control of your Mustang's cold start and choke operation. Mustangs, Etc. makes that control possible with its 289 High Performance manual choke conversion kit for Autolite 4100 and 2100 carburetors. This conversion kit installs in about one hour and affords you new levels of cold start fuel metering control.

Before you install the Hi-Po manual choke system, you must first remove the automatic choke assembly, which can be done in minutes using a screwdriver and needle nose pliers. Installation takes just minutes.



1 This is the Autolite 4100 four-barrel carburetor for the 1965-66 289-4V engine with heat tube style automatic choke, which gets its modulation heat from the hot exhaust manifold. A heat-sensitive bimetallic coil closes the choke plate when the engine is cold. As the engine's right hand exhaust manifold heats up, manifold heat is drawn via manifold vacuum to the choke coil, which expands and pulls the choke and fast idle cam off during warm-up.



The Autolite 2100 two-barrel carburetor is nothing more than a 2V version of the 4100 with primary bores only. The 2100 is equipped with the same automatic choke assembly as the 4100 and can also be converted to manual choke.



3 This is the 289 High Performance manual choke kit from Mustangs, Etc. for Autolite 2100 and 4100 carburetors equipped with automatic choke.



4 Here's a typical off-the-shelf Autolite 4100 carburetor with automatic choke. Removal is easy using a common screwdriver and needle nose pliers.



5

Automatic choke removal begins with thermostatic coil removal with a common screwdriver (flat blade).



A common screwdriver gets these fine-thread machine screws securing the automatic choke.



A C-clip secures the fast idle cam and linkage. Pop this clip and remove the automatic choke.



The automatic choke assembly as it stands as a separate bolt-on assembly.



9 The Autolite 4100 carburetor void of its automatic choke.

We're going to show you how easy it is to fill this spot with a manual hand-choke conversion from Mustangs, Etc.





10 Automatic choke link show here needs to be removed with a ¼-inch socket because the manual choke link has a spring-loaded choke pull-off.



11 Where this gets tricky is the choke blade and shaft. The shaft link is different from an attachment standpoint and must be swapped, which involves grinding the end of the shaft where it is peened, removing the automatic choke link and securing the manual choke link and peening the shaft end or using an industrial adhesive.



12 This is why the link has to be changed. The lock cam is indexed at 9 and 3 o'clock instead of 12 and 6. The manual choke pull-off spring allows some engine breathing with the choke full on.



13 Manual choke link installs like this.



14 Automatic choke heat vacuum port is plugged as shown with a brass plug included in the kit.



15 Manual choke cable adjustment/attachment link is installed first.



16 Fast idle cam and linkage are installed next and secured with a C-clip.



17 Manual choke linkage and fast idle cam are installed.





18 Here is the 4100 designed specifically for the 289 High Performance V-8 with manual choke. Note the main body casting is different due to the absence of the small automatic choke pull-off vacuum port.

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