



SystemMAX™

SystemMAX™

Section	Page #
Overview	232
Chevrolet Small Block V8	233,234
Ford 5.0L H.O. EFI V8	235
Service Parts	236



SYSTEMAX™

OVERVIEW & CHEVY SMALL BLOCK V8 KIT

SystemeMAX™ ENGINE KITS - AN OVERVIEW



SystemeMAX engine packages are systems designed to take the guess-work out of choosing the correct combination of components that will best MAXimize the performance of a small block/big block Chevrolet engine or a small block Ford engine. They are total air flow management systems composed of matched components that, working in unison will enable you to achieve a level of performance and power that you always dreamed about.

The following are available:

SystemeMAX P/N	Engine Application	Horsepower
300-501-1	Ford 5.0 L (EFI)	350 @ 5750 RPM
300-502	Chevrolet 350 (carbureted)	350 @ 4500 RPM
300-503-1	Chevrolet 350 (carbureted)	425 @ 6100 RPM

The Ford 5.0 L EFI systems are designed specifically for the 1986-93 EFI engines. All kits are available either carbureted or fuel injected.

SystemeMAX kits feature top quality Holley, Lunati and Weiland brand components such as cylinder heads, intake manifold, timing chain and gear set and camshaft and lifters. Carburetors are not included, but a Holley carburetor recommendation is made that's based on dynamometer testing results.

SystemeMAX is designed to be delivered as a complete kit because it ideally matches the components for maximum performance. For those on a budget, however, Holley offers SystemeMAX on a component basis.

The Holley SystemeMAX line will continue to be expanded with additional engine applications and different component combinations such as blower kits. The Holley SystemeMAX line allows multiple choices in how you can set up an engine and will keep you on top of the horsepower race!





Holley

CHEVROLET SMALL BLOCK V8 - (1962-86) Part # 300-502 (B)❖

Comments/ Recommendations

A potent, but very driveable street package for a basic stock motor. Add Hooker or FlowTech headers and a 750 CFM vacuum secondary Holley carburetor to tie this package together.

Vital Statistics

Engine production years: 1962-86

Horsepower: 350HP @ 4500 RPM

Torque: 357 lbs./ft. @ 3500 RPM

Kit Contents

Lunati hydraulic camshaft and lifters, P/N 06108LK

Holley dual plane aluminum intake manifold, P/N 300-36

Double roller timing chain and gears

Assembly lube

Camshaft Specifications

Intake valve gross lift/duration: .457"/268°

Exhaust valve gross lift/duration: .457"/268°

Intake valve duration @ .050": 218°

Exhaust valve duration @ .050": 218°

Rocker arm ratio: 1.5

Intake valve lobe centerline: 105°

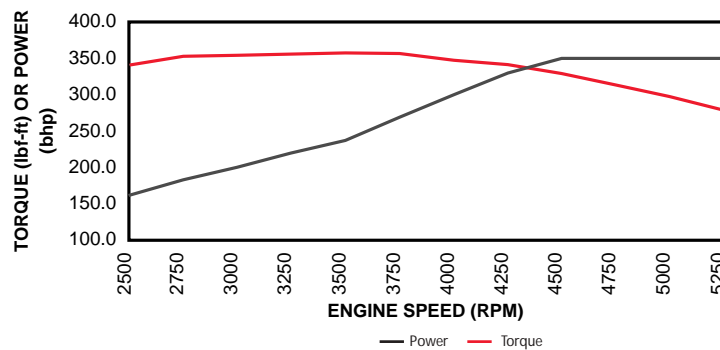
Lobe separation: 110°



SystemAX Recommendations

It's recommended that a 4-bolt main short block be used, although a good 2-bolt main short block can also be used. Minimum cylinder head valve size requirement is 1.94" intake diameter and 1.50" exhaust diameter. Compression requirement is 9.8:1. Holley testing was conducted with a 750 CFM vacuum secondary carburetor, P/N 0-3310. A good set of 1-5/8" tube headers used in conjunction with some high-flow/low back pressure mufflers won't hurt you either. If you're running an automatic transmission a 2,000-2,500 RPM stall converter will help lower drag strip times. New, top quality gaskets for your specific application are required separately and are not part of the package.

CHEVROLET SystemAX I DYNAMOMETER RESULTS



(B) Not legal for sale or use in California on any pollution controlled motor vehicles.

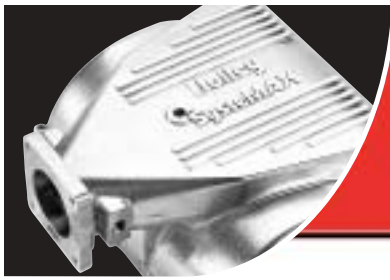
(C) Not legal for street use with a 4-barrel in California on vehicles equipped with a 2-barrel carburetor, for which there was no 4-barrel option.

❖ ❖ or ❖ See page 2 for symbol explanation.

SYSTEMAX™

Tech Line: 270-781-9741

233



SYSTEMAX™

CHEVY SMALL BLOCK & FORD 5.0L EFI KITS

CHEVROLET 302, 327, 350 V8 - (1968-86) Part # 300-503-1 (B)

Comments/Recommendations

This is a maximum performance carbureted street kit that will really light your fire! A zero-decked block with 4-bolt mains and a forged steel crankshaft will get you started. Add Lunati Street Race rods, P/N LHA1; Lunati flat top pistons, P/N 13H1J2S0 for standard bore engines and P/N 13H1J2S3 for +.030" over engines (to achieve 10:1 compression ratio) and Lunati roller rocker arms, P/N 84146 and you end up with a reliable combination of components that will perform. Top it all off with a set of Hooker or FlowTech headers and a 750 CFM Holley and you'll have what it takes. NOS nitrous, of course, is optional.

Vital Statistics

Engine production years: 1968-86
Horsepower: 425HP @ 6150 RPM
Torque: 425 lbs./ft. @ 4250 RPM

Kit Contents

Lunati hydraulic camshaft and lifters, P/N 07104LK
Holley dual plane aluminum intake manifold, P/N 300-36
Double roller timing chain and gears
Fully assembled Holley aluminum cylinder heads, P/N 300-552-1
Hardened push rods, P/N 301-37
ARP® cylinder head bolts, P/N 301-35
Assembly lube

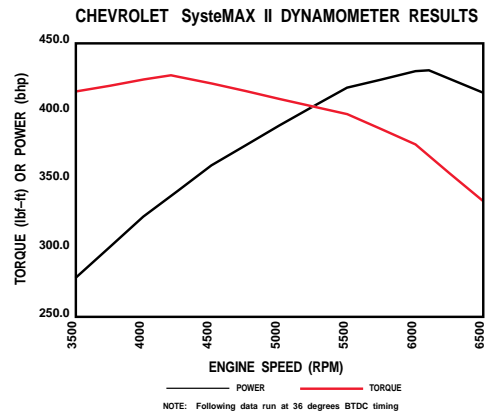
Camshaft Specifications

Intake valve gross lift: .488"
Exhaust valve gross lift: .510"
Intake valve duration @ .050": 234°
Exhaust valve duration @ .050": 244°
Rocker arm ratio: 1.5
Intake valve lobe centerline: 107°
Lobe separation: 112°

SystemMAX II Recommendations

- Chevrolet 350 CID short block
- 4-bolt Mains
- Zero-Decked
- 10.0:1 Compression Ratio
- Forged Steel Crankshaft
- Lunati Rods, P/N LHA1
- Lunati Flat Top Pistons, P/N 13H1J2S0
- Lunati Rings, File Fit
- Auotolite Spark Plug: #3934 (race), #3924 (street)

Holley testing used a 750 CFM double pump carburetor, P/N 0-4779S with a set of 1-3/4" Hooker Super Comp tube headers and high-flow, low-back-pressure mufflers. When using a TH-350 then a 3,000+ RPM stall converter will help lower drag strip times. When using a TH-700R4 transmission, a 2,500+ RPM stall converter will perform best. For all-around great street/strip performance a rear axle ratio of around 3.55 should be used. A set of Lunati, P/N 84146, roller rocker arms is also recommended. New, top quality gaskets for your specific application are required separately and are not part of the package.





Holley

FORD 5.0L H.O. EFI ENGINE (1986-93)

Part # **300-501-1** (B) 

Comments/Recommendations

A maximum performance, but very streetable package for the Ford 5.0L H.O. EFI V8. This one will really let your Mustang kick up its heels! Additional parts recommendations: Holley 70mm Ford throttle body, P/N 112-500; 24 or 30 lb./hr. Holley fuel injectors; Holley 70mm EGR spacer, P/N 112-550; 70mm mass air flow meter; Holley 190 liters per hour in-tank electric fuel pump, P/N 12-901; Holley adjustable fuel pressure regulator, P/N 512-500-1; Lunati 1.6:1 roller rockers, P/N 84160. Add a set of 1-5/8" tube headers (Hooker P/N 6128 or FlowTech P/N 12110), "cat-back" system (Hooker P/N 16862 or FlowTech P/N 42604) and Hooker Aero Chamber mufflers, P/N 21502. **Note:** FlowTech's cat-back system contains mufflers but requires an H-pipe, P/N 53605.

Vital Statistics

1986-93 Ford Mustang, 5.0L H.O. EFI engine
 Horsepower: 350HP @ 5750 RPM
 Torque: 350 lbs./ft. @ 4000 RPM

Kit Contents

- Lunati roller camshaft, P/N 51027LUN
- Holley upper and lower shiny intake manifold, P/N 300-725
 (Upper intake manifold only) P/N 300-74S
 (Lower intake manifold only) P/N 300-75S
- Holley double roller timing chain and gears
- Fully assembled Holley 17° valve aluminum cylinder heads, P/N 300-575
- Hardened push rods, P/N 301-32
- ARP® cylinder head bolts, P/N 301-31

Camshaft Specifications

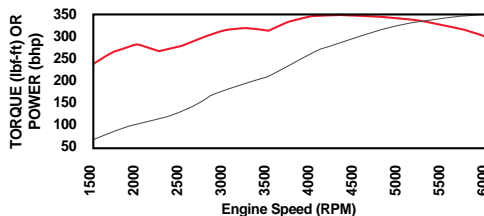
	Intake	Exhaust
Advertised Duration (degrees)	276	280
Duration @ 0.050" (degrees)	221	223
Valve Lift (inches)	0.509	0.509
Lobe Separation Angle (degrees)		112
Opens (degrees)	3.5 BTDC	48.5 BBDC
Closes (degrees)	37.5 ABDC	-5.5 ATDC

SystemAX II Recommendations

A 3.73 axle ratio, for either automatic or manual transmission vehicles, will allow you to take better advantage of the engine's higher RPM torque and horsepower. Spark plug recommended is Autolite P/N 3924.

NOTE ON TRANSMISSIONS: Due to the increased torque and horsepower produced by SystemAX II a heavy duty manual transmission (Ford SVO) must be used. Also, the automatic transmission deserves some attention. One of the Holley engineering test Mustangs used a stock Ford AOD transmission that was modified with a B & M 2500 RPM stall speed torque converter and shift kit. The combination provided very good performance results.

FORD SystemAX II Dynamometer Test Results



NOTE: Must use Holley 241-81 valve covers, NOS Big Shot, Plate kit or a phenolic spacer for proper manifold to valve cover clearance.



(B) Not legal for sale or use in California on any pollution controlled motor vehicles.

(C) Not legal for street use with a 4-barrel in California on vehicles equipped with a 2-barrel carburetor, for which there was no 4-barrel option.

  or  See page 2 for symbol explanation.

SYSTEMAX™

Tech Line: 270-781-9741

235



SYSTEMAX™

ENGINE COMPONENTS

SystemMAX™ ENGINE COMPONENTS

Part #



301-33

CYLINDER HEAD INSTALLATION KIT **301-33**

FORD: 5.0L Holley SystemMAX II Cylinder Heads

Kit contains the necessary compression fitting to lengthen the stock air passage tube that connects to the back side of the heads. Also includes air passage plugs.

Necessary whenever installing Holley SystemMAX II heads.



108-80

GASKET

SystemMAX II Upper and Lower Manifold

108-80

Kormetal gasket used between the Holley SystemMAX II Ford 5.0L upper and lower manifolds.



301-35

HEAD BOLT SETS

CHEVY Small Block Engines

301-35

FORD: 5.0L Engines 1986-93 (7/16" size bolts)

301-31

351 W Engines (1/2" size bolts)

301-36

The same top quality ARP® (Automotive Racing Products) brand hardened head bolts and washers used in the SystemMAX II kit.



301-44

INTAKE MANIFOLD INSTALLATION KIT

Ford SystemMAX II Upper and Lower Manifold

301-44

Kit contains the necessary items needed to install the Holley SystemMAX II upper and lower manifolds on a 5.0L H.O. engine.

Note: This kit is not required for manifolds manufactured after 2/01/2002 with internal EGR.



PUSHROD SET

Chevrolet Small Block V-8

Hardened pushrod set used in the SystemMAX II kit. Made of 4130 chromoly. 5/16" dia. x 8.040"

301-37

Ford Small Block V-8

Hardened pushrod set used in the SystemMAX II kit. Made of 4130 chromoly. 5/16" dia. x 6.40"

301-32

SYSTEMAX™