

FUEL-INJECTED



BY JIM WRIGHT
TECHNICAL EDITOR

AMERICA'S only true production sports car is still going strong after eight years on the market and shows no signs of letting up. True, every year one hears the rumor that the factory is going to drop the beast because they don't make a profit on them. But don't you believe it—the profit on this one is measured in prestige, and Chevrolet loves it. In fact, as long as Chevy continues to build it strictly from the prestige angle, it'll probably remain a great car—built on a straight dollar-profit basis they'd probably ruin it.

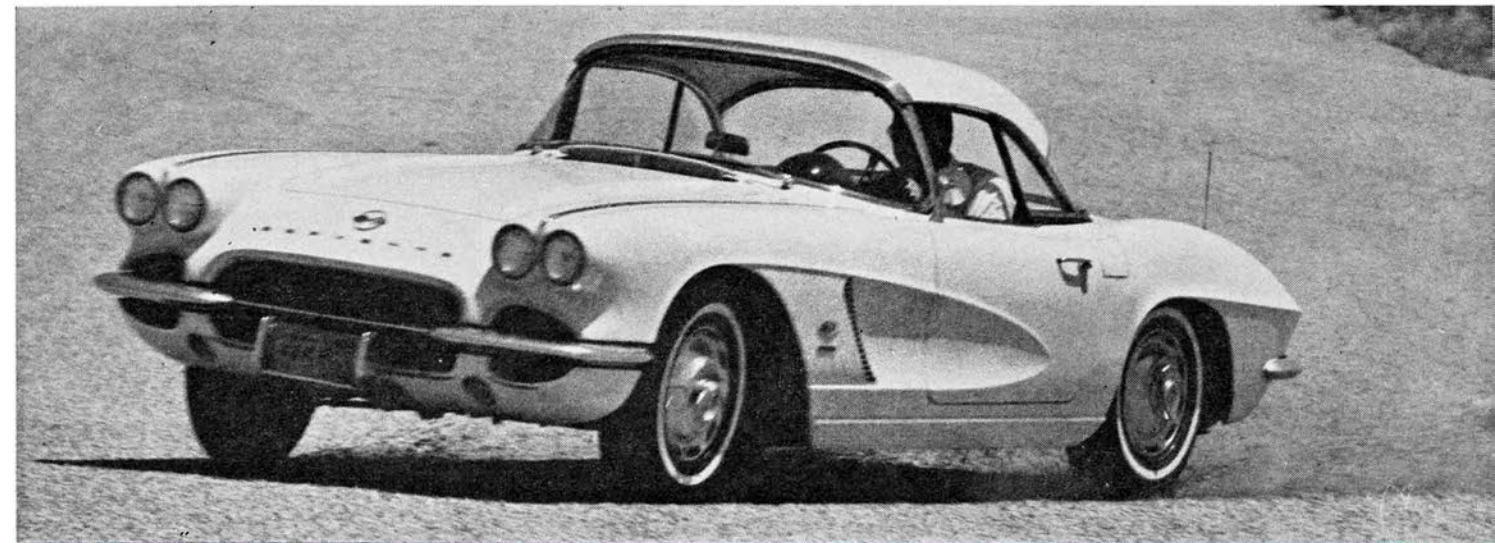
Exterior changes are minor this year: the grille is painted black, a wide piece of chrome trim covers the rocker panel, and the three horizontal bars in the cove have been replaced with a multi-bar grille configuration. The only real change for '62 is in the engine compartment.

The old 283-incher has been bored $\frac{1}{8}$ -inch and stroked $\frac{1}{4}$ -inch to give 327 cubic inches. This is the only engine size available for the 'Vette, but it comes in various stages of tune.

The basic engine uses a single four-barrel, 10.5-to-1 compression ratio, and

a mild cam with hydraulic lifters to put out 250 hp. The addition of a larger four-barrel (RPO 583) ups this figure to 300 hp. RPO 396 consists of the large four-barrel, a wilder cam with mechanical lifters and relieved dome pistons, giving a compression ratio of 11.25 to 1. This one is rated at 340 hp.

The real bear of the line is known as RPO 582 and uses the RPO 396 goodies plus fuel injection to pump out 360 horses at 6000 rpm! This represents 1.1 hp per cubic inch, which is not bad at all—Ferrari 250 GT's put out only two-



CORVETTE

Chevrolet's
sporting
thoroughbred
still sets

the pace for
performance
with a

Yankee accent

Fuel-Injected Corvette · *continued*

tenths more horsepower per cubic inch, and they cost almost four times as much.

A wide variety of power trains is available, and with a little thought, a prospective owner can order just about any combination to meet any condition imaginable.

The three-speed manual transmission is the standard offering with any engine option. The Warner four-speed box is available with either the 2.54 or close-ratio 2.20 low gear, but the factory recommends the 2.54 version with the 250- and

300-hp models. Powerglide can also be had with both of these models.

The standard rear axle for Powerglide and three-speed models is 3.36. The four-speed with 2.54 low also uses the 3.36 ratio, but the 3.08 axle is optional. Close-ratio boxes take a 3.70 axle. Positraction axle ratios are the same for all models, with the exception of the 340- and 360-hp close-ratio combos. With these two, the choice is expanded to include ratios of 3.08, 3.55, 3.70, 4.11 and 4.56.



The MOTOR TREND test car was equipped with the 360-hp engine, close-ratio transmission and 3.70 Positraction rear axle. This car also happened to be the work horse of the local Chevrolet zone office and had over 5000 miles logged on it by everybody from their janitor to such visiting firemen as Astronaut Allan B. Shepard, who had it just before MT. We didn't get a chance to ask him how the car compared to his space capsule, but we'll bet the 'Vette had a better e.t. for the first quarter-mile.

The car felt and sounded healthy when we picked it up, so we didn't do anything to it in the way of tuning. While our times aren't the best you've seen, they are at least the most honest. With the usual load — full gas tank, instrumentation and two up — we racked up 0-to-30, 0-to-45 and 0-to-60 mph in 2.4, 3.9 and 5.9 seconds. Through the quarter-mile trap our fifth-wheel-connected electric speedo recorded a top time of 102.5 mph with a 14.9 e.t.

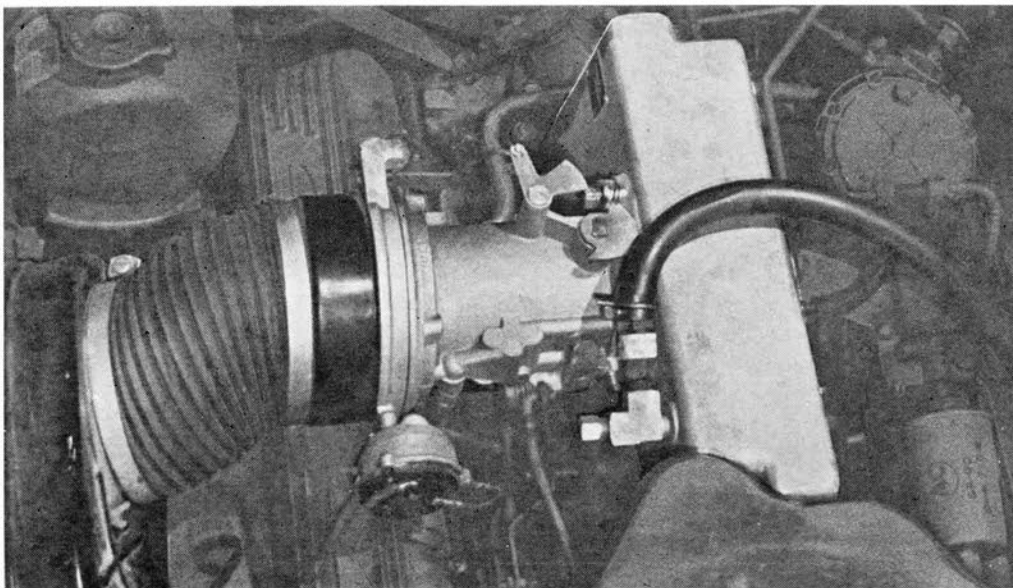
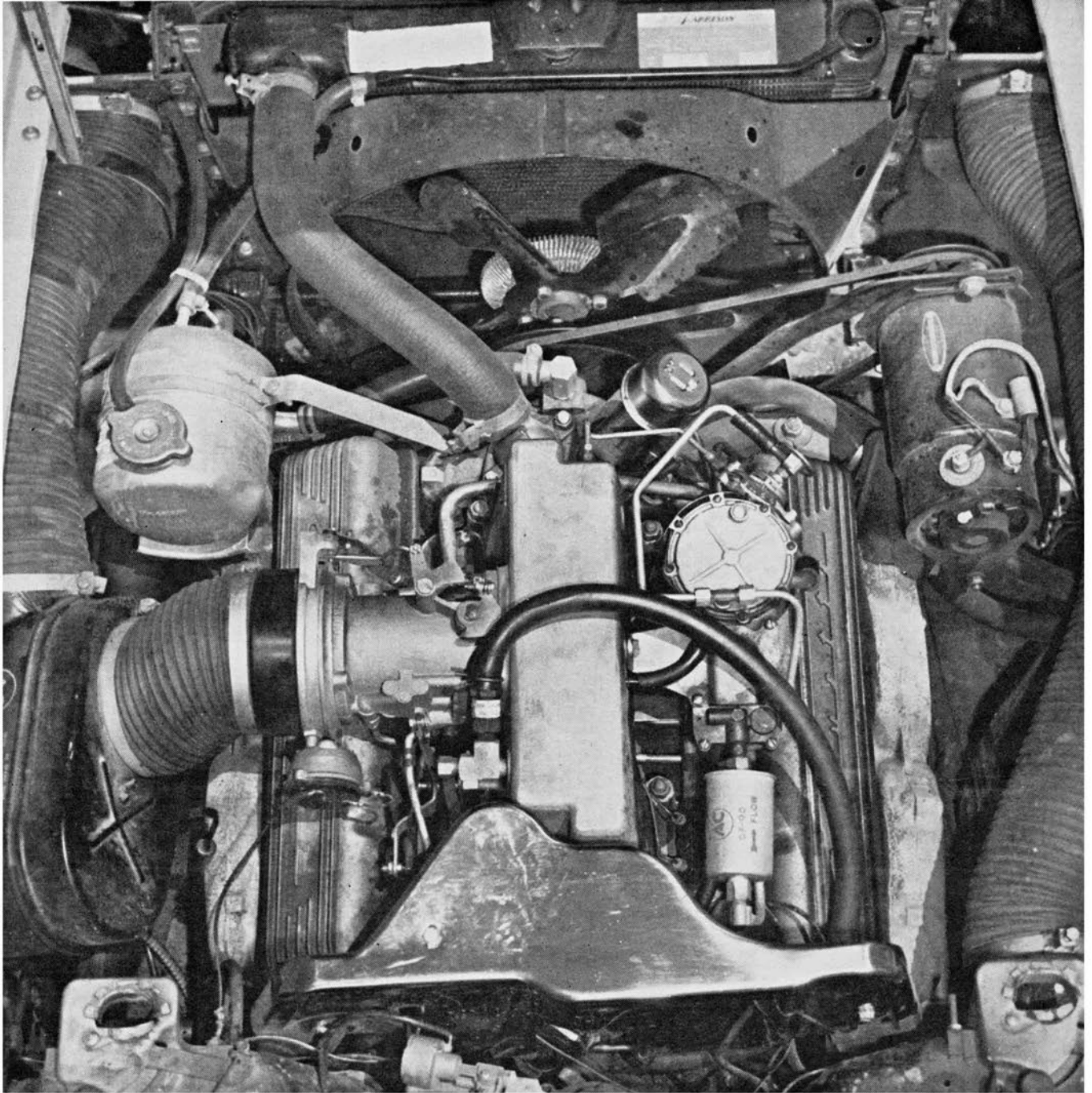
This goes to show that the stock 6.70 x 15 boots aren't the answer for traction. No amount of experimenting off the line could keep the tires from smoking, clear to second gear. Several top-end runs produced an honest 132 mph long before the end of the Riverside straight.

The stock brakes worked well, but after

Longitudinal leaf springs and an upper trailing arm take torque and braking load exceptionally well.



SOME MAY CALL THE STOCK SUSPENSION A BIT STIFF, BUT WE WOULDN'T HAVE IT OTHERWISE. THE CAR REALLY HANDLES IN THE BENDS.



At the top of the Corvette power line, the 360-hp fuel-injected version of the stock 327-cubic-inch 'Vette engine pumps out 1.1 hp per cubic inch! The Rochester fuel injection unit was responsive and smooth at any speed or gear.

Fuel-Injected Corvette *continued*

the high-speed runs they needed a ten-minute break because they were all through. After the binders had their rest we were able to run the regular braking tests, and these were carried off with no apparent fade, grab or swerve. Stopping distances from 30 and 60 mph were 34 and 167 feet.

If you can stand a little squealing and don't mind the heavier pedal pressures, RPO 686 gives more stopping power with sintered iron brake linings. For all-out competition, choose RPO 687. This option includes sintered iron linings with special cooling provisions at each wheel, also

heavy-duty shocks and fast steering adaptor.

We had the car long enough to put over 1000 miles on the odometer, and one trip to the high desert exposed the car to temperatures that ranged from a low of 35° to a high of 93, and the Rochester fuel injection unit worked perfectly. It was very responsive at any rpm in any gear. Even when idling along at 1500 rpm in fourth cog, the throttle can be floored and the car will take off strongly without missing a beat. In fact, around town we seldom used any gears except first and fourth.

It is perfectly docile in city traffic as long as the rpm's are kept above 1500 in the top two gears. The characteristic "lope" of a hot engine isn't felt until the mill is lugged down below 1000 rpm in either first or second. We never had to use any gear but fourth to pass *anything* on the highway above 50 mph. This is like second, or passing gear, in most other cars.

Fuel consumption wasn't too bad. Overall average, for 1000 miles of all types of driving, was 13.8 mpg. This included a low 9.8-mpg figure recorded during acceleration tests and a high 16.4 mpg for open road (65-90 mph) cruising.

The stock suspension feels just about right—a trifle on the hard side, but we, personally, wouldn't want it any softer. We had it up on our favorite mountain road and found we had no trouble negotiating the curves 20 to 25 mph faster than we've been taking them in sedans. The 'Vette is rock-steady and dead-flat in the corners.

Understeer is slight, with the front end pushing only on the tightest corners. At high speeds through sweeping turns the feeling is definitely towards understeer. If the rear end starts to come around, one has to apply corrective steering wheel lock and throttle lightly because the Positraction axle has a tendency to grab a bite and send the car in whichever way the wheels happen to be pointing.

At high speeds (100 to 130 mph) the ride is completely smooth, and the Corvette displays a directional stability and solid road feel that can be matched only by a few high-priced Grand Tourers from Europe.

The interior is unchanged from last year. The vinyl-covered bucket seats are contoured in the right places and give excellent support to the back and upper legs. There is enough fore-and-aft adjustment to satisfy just about any size driver.

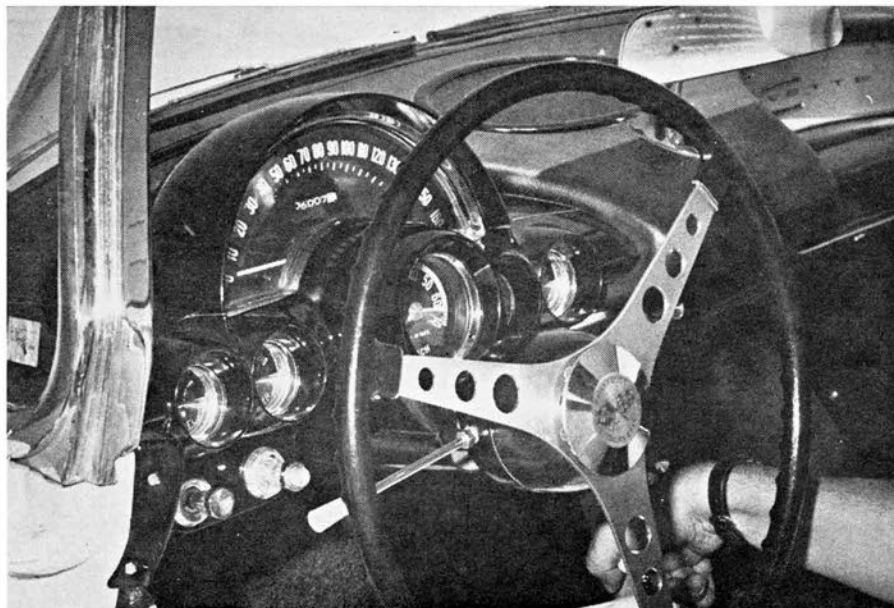
The steering wheel is a beautiful thing, with its three drilled, engine-turned spokes, but its location leaves much to be desired. It is mounted in a vertical position and most drivers will find it too close. It also leaves very little room between the driver's lap and the bottom of the rim. This and the miserably mounted throttle pedal (it kept falling off) are the only real beefs we have with this otherwise completely satisfying car. All-around visibility is good with the soft top in place, and better with the hard top.

The trunk offers a surprising amount of usable space and should be big enough for two people for a weekend. The engine compartment is crowded and it is pure hell to change the plugs, but carburetion and ignition components are in the open.

This is an exciting high-performance automobile with real hair on its chest—the type of car that only the true enthusiasts will appreciate. /MT



For a pure sports machine, the Corvette has a surprising amount of usable trunk space. With spare in its well, there's room for most normal luggage needs.



Instrumentation is fine and well placed. Only complaint is with beautiful steering wheel, which is mounted a bit too close for the comfort of some.



THE BRAKES GRAB WITH POWER BUT NEED SOME REST AFTER HIGH-SPEED RUNS. OPTIONAL SINTERED IRON LININGS ARE A GOOD THOUGHT.

CORVETTE

2-passenger

OPTIONS ON CAR TESTED: 360-hp fuel injection engine, 4-speed, close-ratio gearbox, Positraction rear axle, radio, heater, whitewall tires

ODOMETER READING AT START OF TEST: 5610 miles

RECOMMENDED ENGINE RED LINE: 6300 rpm

PERFORMANCE

ACCELERATION

0-30 mph	2.4 secs.
0-45 mph	3.9
0-60 mph	5.9

Standing start 1/4-mile 14.9 secs. and 102.5 mph

Speeds in gears @ 6300 rpm

1st	60 mph	3rd	94 mph
2nd	80 mph	4th	132 (observed)

Speedometer Error on Test Car

Car's speedometer reading	31	47	53	64	75	85
Weston electric speedometer	30	45	50	60	70	80

Observed miles per hour per 1000 rpm in top gear

Stopping Distances — from 30 mph, 34 ft.; from 60 mph, 167 ft.

SPECIFICATIONS FROM MANUFACTURER

Engine

Ohv V-8
Bore: 4.00 ins.
Stroke: 3.25 ins.
Displacement: 327 cubic inches
Compression ratio: 11.25:1
Horsepower: 360 @ 6000 rpm
Torque: 352 lbs.-ft. @ 4000 rpm
Horsepower per cubic inch: 1.1
Ignition: 12-volt coil

Gearbox

4-speed manual, all-synchro;
floor-mounted shift lever

Driveshaft

One-piece; open tube

Differential

Semi-floating Positraction
Standard ratio: 3.70:1

Suspension

Front: Coil springs, unequal control arms, direct-acting telescopic shocks and anti-roll bar
Rear: Rigid axle, 4-leaf longitudinal semi-elliptic springs with radius rods, limit straps, anti-roll bar and direct-acting telescopic shocks

Steering

Worm and ball bearing sector
Turning diameter: 37 ft.
Turns: 3.7 lock-to-lock

Wheels and Tires

Steel disc—5 lugs
6.70 x 15 4-ply
whitewall tires

Brakes

Hydraulic; 11-inch, cast-iron drums; bonded linings
Front: 9.29-in. dia x 2.0 in. wide
Rear: 9.29-in. dia. x 1.75 in. wide
Effective lining area: 157 sq. ins.

Body and Frame

Box section rails with I-beam cross member; fiberglass body
Wheelbase: 102.0 ins.
Track: front, 57 ins.; rear, 59 ins.
Overall length: 176.7 ins.
Curb weight: 3137 lbs.