

Take a 2+2, inject some Cobra venom, tone up the leg muscles, add lightness, and you get a...

# MUSTANG GT-350

by John Ethridge, *Technical Editor*



**WHEN FORD DECIDED** to go racing with the Mustang, they wisely first consulted their oracle for such matters, Carroll Shelby. Shelby's Los Angeles-based company, Shelby American, builds the all-conquering Cobras. Starting with the 1965 season, Shelby has taken over all Ford's road-racing operations. He knew that the first order of business was to get the SCCA to accept a raceable version of the Mustang in a competitive production sports car class. This was ultimately done (Class B), but with the stipulation that at least 100 more-or-less similar models of the proposed two-seater be built. Realizing that at first, anyway, they couldn't find 100 racing customers, they decided to make a street version as well.

Our test car was the street GT-350, which is the model most of Shelby's customers will order. Shelby receives the 2+2 semi-completed from the Ford assembly plant, and this forms the basis for either the street or competition car. Anyone who intends to drive on the street wouldn't want, need, or be willing to pay for the racing goodies and features of the competitive version. Gumball tires, magnesium wheels, oil cooler, plastic rear and side windows, gutted interior, and fiberglass seats are for the race course.

Although the most apparent difference between our test car and an ordinary Mustang is the absence of rear seats and the interior-mounted spare tire, the real difference is in suspension, engine, and weight. Between removal of the rear seats plus cutting and paring here and there, they've trimmed exactly 200 pounds off the weight of the Mustang 2+2 we tested in January. There are 35 more horses under the fiberglass hood, provided by a large Holley four-barrel carb on a special high-riser intake manifold, plus exhaust

headers leading into twin pipes and straight-through mufflers.

Suspension has actually gotten the most attention of all. The words here are: control, limit, locate, stiffen, and snub. The Mustang performance handling kit springs are retained for use all around, but the shocks are special Konis. The rear axle got a pair of stabilizer bars, located above and parallel to the forward half of the leaf spring. Each chassis anchor for the bars appears to occupy what would've been part of any rear-seat passenger's anatomy with the standard 2+2 seats. This probably accounts for the absence of rear seats in the street GT-350. Rebound and jounce limiters complete rear suspension modifications.

Most noticeable change in the front suspension is a very substantial-looking anti-roll bar. The Shelby people tell us there are subtle changes in front suspension geometry, but we couldn't detect them by looking.

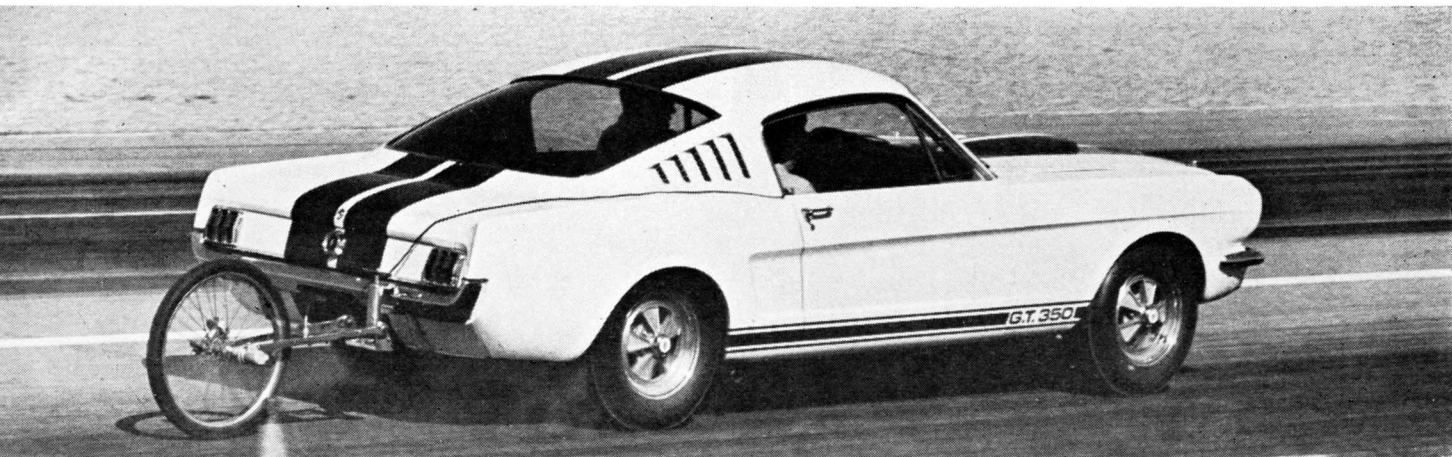
A weight-transfer program was carried out along with the weight-reduction program. Relocating the battery in the trunk and using the fiberglass hood were the major steps taken to reduce the proportion of weight carried by the front wheels. This permits use of the power-steering ratio in a manual setup. This improved steering transforms the car. It's wonderfully quick and light — even with the big tires.

When you start the engine, you're first impressed with a raucous note from the twin exhausts. These emerge just in front of each rear wheel. They're actually louder *inside* the car, because there's no insulation or undercoating. Not everyone will appreciate the cockpit noise and firm ride, but we're sure no enthusiast will ever complain. The engine's willing and responsive, and the carb/manifold setup hasn't made it temperamental in the least. Maybe it's just a bit cold-

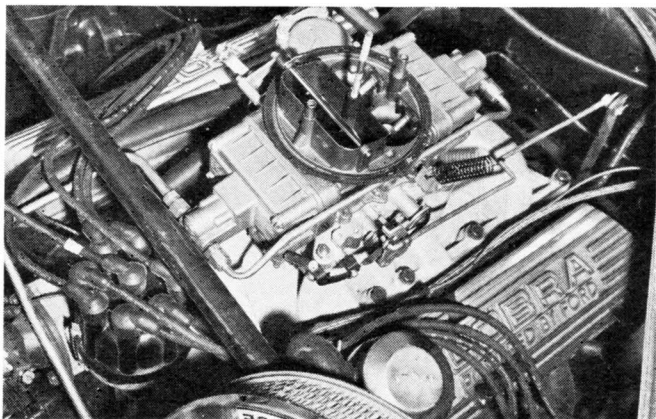
PHOTOS BY PAT BROLIER, DARRYL NORENBURG



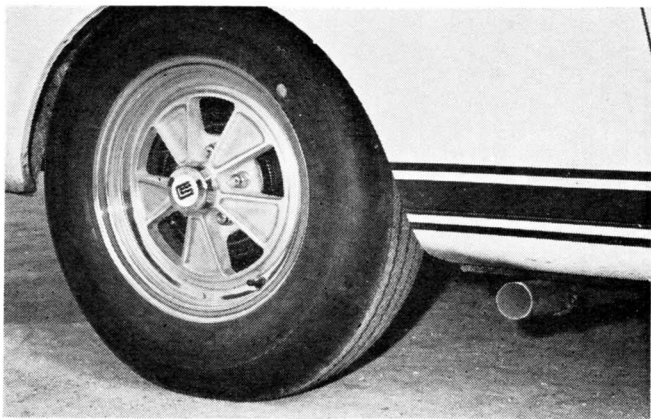
AT NEAR MAXIMUM CORNERING CONDITIONS, THERE'S VERY LITTLE LEAN. BLUE SPOT TIRES STICK AND DON'T ROLL UNDER LIKE ORDINARY ONES.



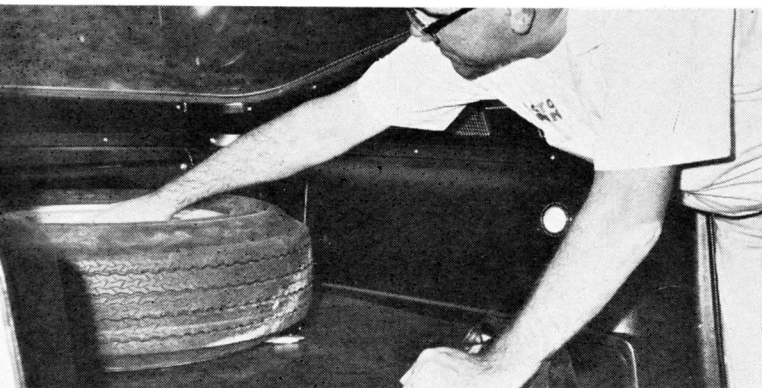
**STRONG LIMITED-SLIP DIFFERENTIAL LETS YOU LEAVE TWO LONG, BLACK STREAKS. BUT TOO MUCH WHEELSPIN WILL HURT ACCELERATION.**



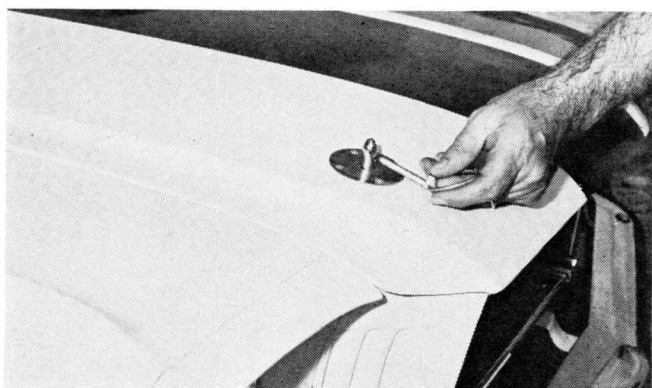
*Big Holley carb's almost as long as engine block. Added cross-member triangulates engine bay, complicates rotor cap removal.*



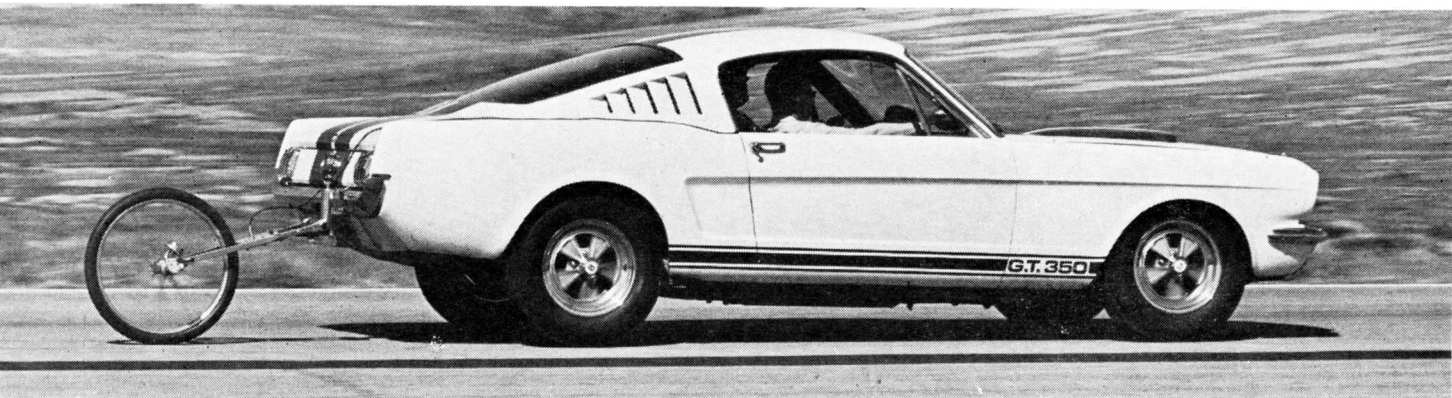
*Custom wheel, designed especially for the GT-350, is sole accessory. Side exhaust's handy for issuing challenges at drags.*



*Spare perches atop aluminum panel where seats used to be. Tidy cover slips on for appearance. Panel won't support extra weight.*



*Fiberglass hood is hinged at rear and pin-latched same as racing stock cars. Aircoop actually admits air to the air cleaner!*



**BRAKES COULD HARDLY BE BETTER. THEY SIMPLY BRING THE CAR TO A STRAIGHT-LINE STOP IN A VERY SHORT DISTANCE, WITH NO WHEEL LOCK.**

natured on cold mornings, but it warms up quickly and runs normally within a block or two.

Handling is much improved over even the handling-kit-equipped normal Mustang. The GT-350's best handling qualities won't show with half-hearted cornering, though. You have to corner hard enough to take all the slack out of the suspension in one direction. Then you get (on smooth surface) a sensation of superb stability, and you can feel the tires really bite. The GT-350, in fact, develops so much cornering force that the idiot light came on and the gauge wavered (it has both) on several occasions due to oil surge in the sump. You'd need some baffling if you drove this way regularly.

The car's still a basic understeerer, but nowhere near so much as the regular Mustang. Hard-over-to-hard-over maneuvers, as in a series of esses, produce the most noticeable handling peculiarity. Due to the high center of gravity, the suspension has to deal with some very high dynamic rolling moments under these conditions. When the body rolls from one extreme to the other, it tends to force the tail out momentarily. But with practice, we were able to smooth and tidy up our negotiation of esses considerably.

If you're looking for some justification or excuse for getting a GT-350, it gives very good gas mileage for such a high-performing car. Our best was just under 17 mpg when driving at steady legal speeds on freeways. The low, 11.2, came during performance testing. Average for our 900-mile test was 14 mpg.

The GT-350 is one car that'll never put you to sleep at the wheel. We recommend it as a sure cure for all strains of boredom. It positively exudes character — something rare in this day of follow-the-crowd compromises and design by large committees. The only really unpleasant moment we had with the car was when we had to give it back.

At present, you can have any color GT-350 you want, as long as it's white with blue trim. A no-cost option is 4.11 gears instead of the 3.89 set. The list of extra-cost accessories consists of a set of four custom wheels in place of the standard steel ones. The warranty is the same as Ford's for high-performance stuff: 4000 miles or 90 days. /MT

## 1965 MUSTANG GT-350

2-door, 2-passenger fastback coupe

**OPTIONS ON TEST CAR:** Custom wheels

**BASE PRICE:** \$4547

**PRICE AS TESTED:** \$4820 (plus tax and license)

**ODOMETER READING AT START OF TEST:** 2222 miles

**RECOMMENDED ENGINE RED LINE:** 6500 rpm

### PERFORMANCE

**ACCELERATION** (2 aboard)

0-30 mph.....	2.7 secs.
0-45 mph.....	4.5
0-60 mph.....	7.0

**PASSING TIMES AND DISTANCES**

40-60 mph.....	2.9 secs., 215 ft.
50-70 mph.....	3.7 secs., 325 ft.

Standing start 1/4-mile 15.7 secs. and 91 mph

Speeds in gears @ shift points

1st .....	56 mph @ 6500 rpm	3rd .....	108 mph @ 6400 rpm
2nd .....	82 mph @ 6500 rpm	4th .....	125 mph @ 6100 rpm (observed)

Speedometer Error on Test Car

Car's speedometer reading.....	32	47	53	64	74	85
Weston electric speedometer.....	30	45	50	60	70	80

Observed mph per 1000 rpm in top gear.....20.5 mph

Stopping Distances — from 30 mph, 24.5 ft.; from 60 mph, 140 ft.

### SPECIFICATIONS FROM MANUFACTURER

**Engine**

Ohv V-8  
Bore: 4.00 ins.  
Stroke: 2.87 ins.  
Displacement: 289 cu. ins.  
Compression ratio: 10.5:1  
Horsepower: 306 hp @ 6000 rpm  
Horsepower per cubic inch: 1.06  
Torque: 329 lbs.-ft. @ 4200 rpm  
Carburetion: 1 4-bbl.  
Ignition: 12-volt coil

**Steering**

Recirculating ball and nut  
Turning diameter: 39 ft.  
Turns lock to lock: 3.7

**Wheels and Tires**

14 x 6.0 J, 5-lug, aluminum center, steel rim wheels  
7.75 x 14 4-ply Goodyear Blue Spot tires

**Brakes**

Hydraulic, front, disc; rear, duo-servo  
Front: 9.5-in.-dia. caliper discs  
Rear: 10-in. dia. x 1.75 ins. wide  
Effective lining area: N.A.  
Swept drum area: N.A.

**Body and Frame**

Unitized; bolt-on front fenders  
Wheelbase: 108.0 ins.  
Track: front, 56.0 ins.; rear, 56.0 ins.  
Overall length: 181.6 ins.  
Overall width: 68.2 ins.  
Overall height: 52.2 ins.  
Curb weight: 2800 lbs.

**Gearbox**

4-speed manual, all synchro; floorshift

**Driveshaft**

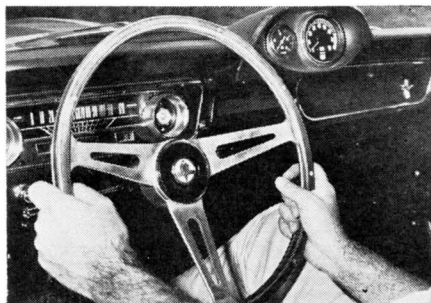
1-piece, open tube

**Differential**

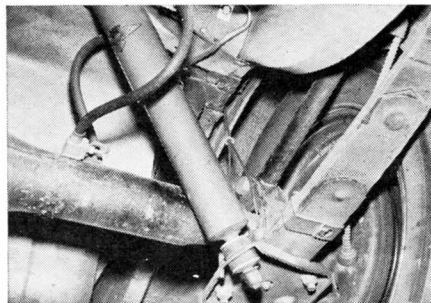
Hypoid, semi-floating  
Standard ratio: 3.89:1

**Suspension**

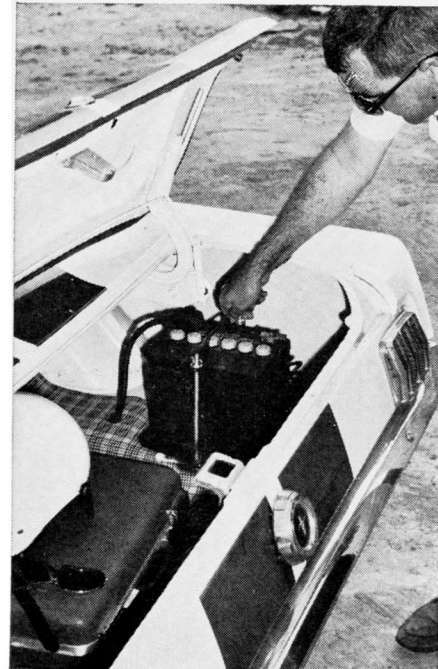
Front: Independent SLA, with high-mounted coil springs, double-acting tubular shocks, and heavy-duty anti-roll bar  
Rear: Solid axle, with semi-elliptic leaf springs, double-acting tubular shocks, control arms, and rebound straps



Cobra steering wheel, oil pressure gauge, and tachometer are added. Horn is on dash.



Heart of suspension modification is rear stabilizer bar, Koni shock, and cable strap.



Relocated battery has tray and drain, but sloppy service attendants could fault it.