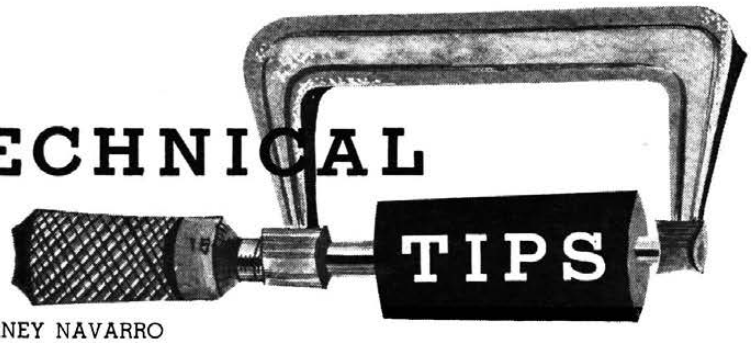

BY BARNEY NAVARRO

MORE HORSEPOWER

I have just purchased a '55 Ford Fairlane and am eager to add a few things to increase performance and top speed. Have planned on a Mallory distributor and coil for one thing. What else do you suggest?

Jack Ross Kansas City, Mo.

• *Special ignitions are not the inexpensive path to horsepower. Their purpose is to make up for a deficiency in much the same way that glasses help some people with weak eyes to see as well as those with normal eyes.*

If you desire an ignition that will fire better at high rpm and allow the engine in a modified state to attain a higher rpm than the stock ignition, the Mallory Magspark transformer and point conversion kit are the answer.

When thinking of modifying a new model engine, one must keep in mind that the manufacturers are now applying the majority of hop up principles to their products. Your car already is equipped with maximum compression and carburetion, so all that is left is supercharging and overboring.

ARGUMENT ON TORQUE

I have discussed the subject of horsepower and torque with a local mechanical engineer who bases his attitude on automotive writers quoting a figure of torque on a given engine at a given number of revolutions per minute. He brands this as propaganda and poppycock, argues that when you insert the words "revolutions per minute" you add time and distance which then converts the torque to work done, which is then horsepower. He says we should disregard "torque" and simply say "low-speed horsepower."

Neal E. Mann Bountiful, Utah

• *Your friend's argument is philosophical instead of physical. The discussion of torque and horsepower shouldn't be bandied about in the manner of "which came first, the chicken or the egg?" He is right about torque without rpm being meaningless, but the main reason for stating the rpm is not so that time and distance factors may be presented, thereby making it possible to compute horsepower. Torque varies with rpm, so rpm is of utmost importance in appraising the performance of an engine. The point where maximum horsepower is produced is never the same as the rpm where maximum torque is available.*

The most valid excuse for laying so much stress on torque instead of publishing horsepower curves, lies in the fact that interpretation is easier and evaluation is unnecessary. A car owner can correlate the relationship between the thrust required to accelerate his car and the torque of the engine much easier than if he must analyze the problem from a horsepower standpoint.

GOOD GAS MILEAGE

In the April issue of MOTOR *Life* I saw the road test report that gave 19 mpg at 60 mph on the Olds Super 88. I have a new Super 88 and so has my father and we both get 13 mpg at 60 mph (steady). Would a Cadillac carburetor on my Olds give me better mileage without losing any other performance?

Kenneth Hudson Des Moines, Ia.

• *The 19-mpg figure on the test car was obtained with a fuel-flow gauge after the car had attained a speed of 60 mph and while it was traveling on a perfectly level road. It did not measure the fuel used accelerating to 60 mph, nor the amount required for negotiating small hills. Your fuel consumption figures, on the other hand, must be arrived at by noting the amount required to fill the tank after a trip. Changing to the Cadillac carburetor will not help the gas mileage of your Olds.*

CHANGING REAR AXLE RATIOS

I have a '55 Ford Victoria with a 3.3-to-1 rear axle ratio. I am not interested in fast starts or high speeds, but would like to get better mileage and longer engine life on the flat Texas highways. Can I change to a 3-to-1 ratio?

F. Harrison Houston, Tex.

• *The change would improve mileage and engine life under the conditions you describe. However, it would not make it possible to utilize the 182 hp of the engine which can be obtained only at the rpm where it produces maximum horsepower (4200 rpm). A 3-to-1 ratio will allow only a fraction of the 182 horses to be available at 60 mph. Incidentally, the 3-to-1 gears would have to be made specially and the cost would be prohibitive.*