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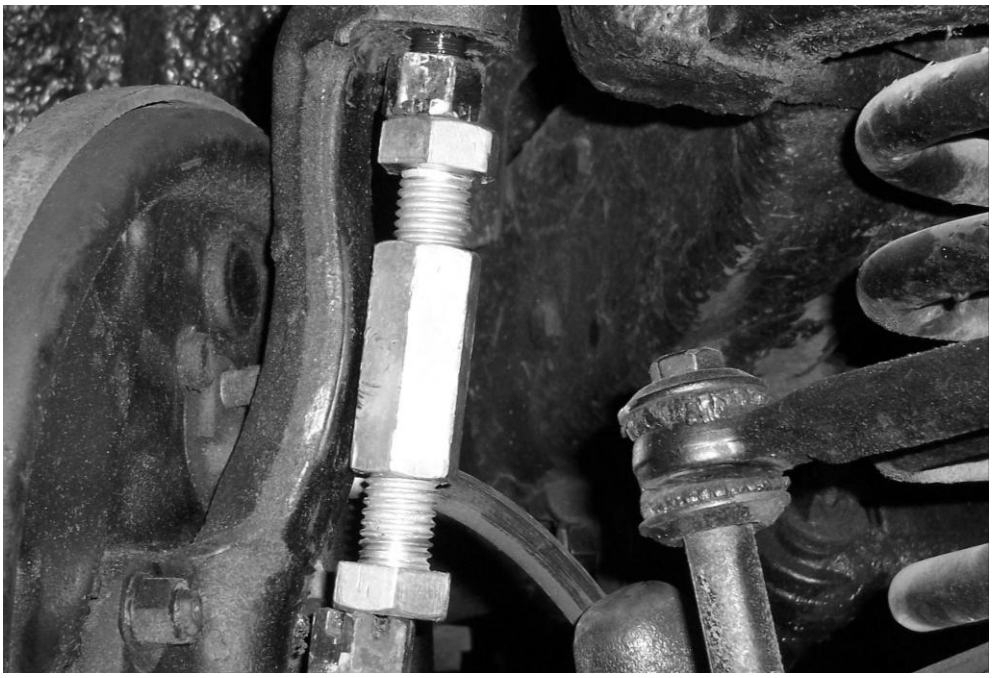
Drop Spindle Installation Instructions For 1954-72 Ford/Mercury, 1955-57 and 1961-66 Thunderbird

1) In addition to these spindles you'll need a complete set of rotors, bearings (A12 and A13), and seals (S6815) for a 1975-80 Granada/Monarch or 1974-77 Maverick. We have supplied spindle nuts, washers, and cages to install those rotors. The dropped spindle has been manufactured with a mount for calipers, pins, and pads from a 1970-77 Camaro which can be sourced from us directly or any good parts store as a loaded caliper rather than buying those parts individually. Your original ball joints and outer tie rod ends will fit as is.

2) Remove the original spindle as an assembly complete with brakes. The picture below illustrates a very handy tool made from a hex coupling and a pair of 1-1/2" long bolts from the hardware store. Remove the ball joint cotter pins and loosen the castle nuts a couple of turns only. The ball joints will easily pop loose from the spindles.

On the 1957-72 cars with stamped lower control arms, it sometimes occurs that the end of the lower arm near the ball joint can contact the inner face of the disc brake rotor. If this happens on your car rather than cutting or grinding the arm for clearance use a hammer to roll the stamped arm lip more tightly around the ball joint. That should gain you the 1/8" clearance you need.



3) On cars with bolted on original steering arms (1954-56 Ford, 1955-57 T-bird, 1952-57 Lincoln) use the supplied 1/2" x 2-1/2” flathead socket head bolts to reattach them. The arms are moved inboard 3/4” to clear larger tires so the tie rods will need to be adjusted nearly all the way in to get toe-in correct. In rare cases it may help to remove 3/8” from the tie rods to avoid them bottoming out in the adjusting sleeve. Some 1954-56 cars have a particular design front sway bar bracket which will need a small trim to clear the hoop of the steering arm in its new position. The steering arm is welded on later applications and will fit as is.

The lower control arms have a steering stop welded on which restricts turning radius too much with dropped spindles. It is spot welded to the lower arm so the easiest way to remove it is to drill the stop at the spot weld marks and it will pop right off. The photo shows the stock arm on the left and the modified on the right. You can do this with the arms still on the car or while rebuilding the arms as we did.

Aftermarket wheels will fit the Granada rotors as is. Some original 15" drum brake wheels will fit by turning the very heavy outer bearing hub to 2.610" matching the hole in the early style wheels. On our own 1956 Ford with stock wheels, we had a tiny bit of interference between the GM caliper and the wheel center. A little grinding on the caliper casting relieved the interference.

4) The new spindles will bolt directly in place on the ball joints. If your ball joint boots are damaged NAPA now has replacements under part numbers 650-1177 and 650-1178 for the larger lower ball joint.

5) Use normal mechanical practice to grease the bearings, install the grease seals, and bolt on the Granada rotors. Add the GM calipers and pads on the rear side over the steering arm. Use the caliper pins to attach the GM caliper to the bracket on the spindles following procedure for any 1970-81 Camaro type caliper mount. Be certain that the caliper bleeder screw is pointing up. NAPA has a banjo bolt #82698 for the hose mount on the caliper and a 1970-81 Camaro hose can be used. Be sure to use a copper washer (NAPA #1243 if you lost the ones supplied with the new caliper) on EACH side of the brass block on the brake hose.

We also can supply a braided stainless brake hose kit that includes everything you will need and generally costs less than OEM rubber hoses!

6) If you updated a drum brake car to a late model dual master cylinder, be sure it is for a car with disc front brakes. Connect the front disc brakes to the larger reservoir. Power boosted master cylinder assemblies are available, or you can adapt a 1974-78 Mustang II master cylinder (NAPA #10-1614) to your manual pedal assembly. A drawing is included below for a simple filler plate that will allow the Mustang II master cylinder to bolt to your firewall replacing the original 4-bolt unit. The new pushrod should fit right to your pedal assembly. Be sure to adjust the eccentric bolt at the pedal to ensure a little free play to avoid the brakes dragging. The small rear brake reservoir uses an over size nut. It can be made using a Weatherhead #131 x 4-1/4" flare plug which you drill through to 3/16" to fit standard brake line. We have supplied a brass fitting to simplify remounting the stock hydraulic brake light switch.

7) Have the car realigned with stock specs and go for your test ride. Find an empty lot to test the brakes at speed. If the rear brakes lock up too soon add an adjustable rear proportioning valve. It can drop rear line pressure to avoid lock up. If you are using a larger rear tire than in front a proportioning valve is normally not needed.

1954-56 Ford Master Cylinder Plate
mat'l 4" x 4" x 3/16" HRS