FORD MOTOR CO., SINGLE ARM

Capri & Mustang
Cougar & Granada
Fairmont & Zephyr
Thunderbird & XR7

DESCRIPTION

Front suspension is modified MacPherson strut type with coil spring located between lower control arm and No. 2 crossmember.

ADJUSTMENT

CASTER & CAMBER

See Caster and Camber Adjustments and Specifications in WHEEL ALIGNMENT Section.

RIDING HEIGHT

See Riding Height Adjustments in WHEEL ALIGNMENT Section.

FRONT WHEEL BEARINGS

See Wheel Bearing Adjustment in WHEEL ALIGNMENT Section.

BALL JOINT CHECKING

See Ball Joint Checking in WHEEL ALIGNMENT Section.

REMOVAL & INSTALLATION

BALL JOINTS

NOTE – *Ball joints and lower suspension arm bushings are not serviced separately and must be replaced as an assembly. Ball joint seals are replaceable.*

STABILIZER BAR BUSHING & INSULATOR

Removal – Raise vehicle and place support under lower arm. Disconnect each stabilizer link, insulator attaching clamps and remove bar assembly. Cut worn sleeves and insulators from stabilizer bar.

Installation – Lubricate necessary parts and install plastic sleeves with flange inboard. Slide insulators onto bar over sleeves. Be sure insulator is fully seated against flange. Use new attaching hardware and tighten bolts.

LOWER CONTROL ARM

Removal – 1) Raise vehicle and place stands just behind control arm on jack pad. Remove wheel and tire, then disconnect stabilizer bar link. Remove brake caliper and rotor. Remove steering gear bolts and position gear out of way.

2) Use tie rod removal tool 3290C to remove tie rod from spindle. Remove cotter pin from ball joint stud nut and loosen nut one or two turns. Tap spindle boss sharply with hammer to

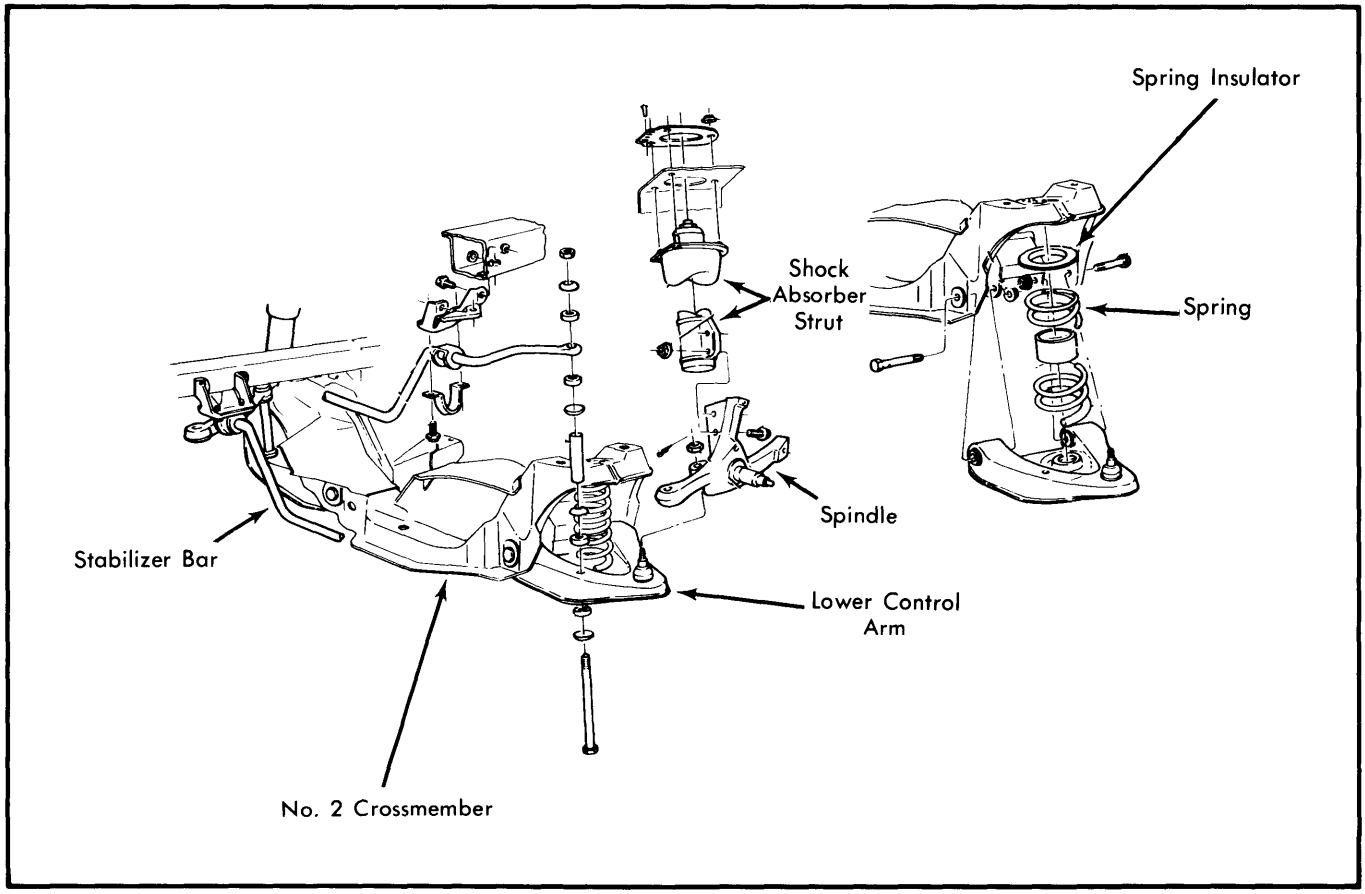

Fig. 1 Exploded View of Ford Motor Co. Single Arm Front Suspension Assembly

FORD MOTOR CO., SINGLE ARM (Cont.)

relieve stud pressure. Place floor jack under lower arm, supporting arm at both bushings. Remove both control arm bolts, lower floor jack and remove coil spring. Remove ball joint nut and remove arm assembly.

Installation – To install, reverse removal procedure and check front end alignment.

COIL SPRING

Removal – **1)** Raise front of vehicle and place jack stands under both sides at jack pads just behind lower arm. Remove wheel and tire. Disconnect stabilizer bar link from lower arm. Remove steering gear bolts and move gear out of the way.

2) Disconnect tie rod from spindle with puller. Using spring compressor, install 1 plate with pivot ball seat down into coils of spring.

3) Rotate plate so it is fully seated in lower arm spring seat. Install other plate with pivot ball seat up into coils of spring. Insert ball nut through spring coils so it rests in upper plate. Insert compression rod through opening in lower arm, then through lower and upper plate.

4) Install upper ball nut on rod and return the securing pin. With ball nut secured, turn upper plate so it walks up through spring and contacts upper spring seat. Install lower ball nut, thrust bearing and forcing nut on compression rod.

5) Rotate nut until spring is compressed enough to be free in its seat. Remove lower arm pivot bolts and disengage lower arm from crossmember. Remove spring assembly.

Installation – **1)** To install, reverse removal procedures noting the following: If a new spring is to be installed, measure compressed height of removed spring and place compressor tool on new spring with the same compressed height.

2) Make sure upper ball nut securing pin is positioned properly. Ensure lower end of spring is properly positioned between the 2 holes in lower arm spring pocket depression.

FRONT WHEEL SPINDLE

Removal – **1)** Raise vehicle and support with safety stands placed behind lower control arm at jacking pads. Remove wheel and tire. Remove brake caliper, rotor and dust shield. Remove stabilizer link from lower arm.

2) Remove tie rod end from spindle with puller. Remove cotter pin from ball joint stud nut, and loosen 1 or 2 turns. DO NOT remove the nut. Tap spindle with hammer to relieve ball stud pressure.

3) Place a jack under lower arm, compress spring and remove stud nut. Remove bolts attaching spindle to shock strut. Compress shock strut until sufficient clearance is obtained, then remove spindle assembly.

Installation – To install, reverse removal procedure and tighten all nuts and bolts.

SHOCK STRUT

Removal – **1)** Place ignition key in unlock position. From inside engine compartment, remove strut-to-upper mount attaching bolt. A screwdriver in the slot will hold the rod still while removing the nut. Raise vehicle and place safety stands under frame jacking pads.

2) Remove wheel and tire. Remove brake caliper and move out of way. Remove lower 2 nuts and bolts holding strut to spindle. Lift strut up from spindle to compress rod, then pull down to remove strut.

Installation – **1)** With rod half extended, place rod through upper mount and hand start a new nut, engaging as many threads as possible. Extend the strut and position in the spindle. Install new lower mounting bolts and hand start nuts.

2) Tighten strut-to-upper mount bolt inside engine compartment. Lower vehicle and tighten lower mounting bolts. Raise suspension control arms and install brake caliper. Install wheel and tire and remove safety stands.

UPPER MOUNT

Removal – **1)** Place ignition key in unlock position. Remove strut-to-upper mount attaching bolt inside engine compartment. Raise vehicle by lower control arms until it is just off the ground.

2) Remove wheel and tire. Push strut rod down through upper mount. Remove 3 upper mount retaining nuts and remove upper mount.

Installation – To install, reverse removal procedures.

TIGHTENING SPECIFICATIONS

Application	Ft. Lbs.
Lower Arm-to-Crossmember	200-220
Stabilizer Bar-to-Lower Arm	8-12
Stabilizer Mounting Clamp-to-Bracket	25-30
Ball Joint-to-Spindle	80-120
Shock Strut	
Upper	60-75
Lower	150-180
Tie Rod End-to-Spindle	35-47
Steering Gear-to-Crossmember	90-100