## FAT MAN FABRICATIONS

## INSTALLATION INSTRUCTIONS FOR STEEL TUBULAR MUSTANG II CONTROL ARMS

The upper arms must have the knurled surface of the cross shaft against the upper surface of the shock tower in order to maintain the alignment position in the slots. An exception is the Stage III coilover, and Stage V shockwaves, where the shaft is rotated 90 degrees in order to use the shims and horizontal bolts. The arms are the same left and right, and must have the ball joints assembled pointing down. (The ball joints are Moog #K-772 which is used on many Mopar applications in the 60's and 80's. A special socket is available to install these ball joints, which may be used if you have access to that tool.)

The lower control arms are installed with the straight tube to the rear, where we will be installing a gusseted spacer later on. The spindle's lower tapered holes are slightly larger, so a spacer is supplied to ensure that the castle nut will pull up tight before running out of thread. The spacer goes on top of the spindle, under the nut. During mockup assembly, leave the nuts finger tight. Final assembly requires the nuts to be quite tight and then turned and additional amount in order to line up with the drilled hole for the cotter pins.

If you ever need to remove the spindles from the ball joints, make yourself a simple press with two ¾ x 1" bolts and a matching hex stock coupler from the hardware store. Loosen the ball joint castle nuts a few turns and ten use the bolt heads to push the studs apart. This will preserve your paint, ball joint boots, and peace of mind!

Stage II units use a urethane spring support which must be installed so that the lower end of the coil spring is out board, near the ball joint. The 5/8" hole near the ball joint is used to accept the sway bar bushings when one is used.

Remember to grease the ball joints, and then the polished stainless ball joint covers can be installed. According to your sense of style versus serviceability, either the grease fittings or the flathead screws can be used to retain the caps. If the ball joint discs rotate, a center punch can be used to stop this and allow installing the screws.

If the crossmember was made for stock stamped arms, the 1/2" control arms holes must be drilled to 5/8" and the bolt support tube welded inside the crossmember. If your crossmember was purchased with steel tubular mustang II arms in mind, these steps are already performed. All will require the rear bolt support and gusset to be welded to the rear side of the crossmember. Coat the 5/8" bolt with antiseize, and use it to align the bolt support tubes.

The bottom and top pivot nuts **should only be tightened** ½ **turn** past the point where the washer can no longer be rotated. Over tightening will cause squeaks, excess wear, and a harsher ride. The pivot bushings are impregnated with graphite and require no lubrication. Should you feel the need to lube them anyway, <u>a silicone</u> <u>based grease</u> **must be used, as petroleum based** 

## grease will harden and ruin the bushings.

Standard 74-78 Mustang II shocks are used on Stage II kits. With the usual low street rod in mind, we have made the shock mounts to allow an extra inch of travel without bottoming. The Mustang II shock has a rubber stop which **must be removed** for full travel, and the upper mount uses two washers to support the two rubber bushings.

If your personal taste is to sit closer to stock ride height, the shocks may be changed to a '76 Chrysler Cordoba unit by simply adding two washers to accommodate the slightly shorter lower mount tube. It is 1" taller at full extension and will allow more travel without topping out the shock. Stage IV AirRide systems use a '73-'87 Chevy pickup front shock.

Remember that you cannot finalize the spring adjustment until ALL the weight is in place. The bumper, hood, radiator, glass, and interior weigh more than you might think. A solid bar made from 1/2"x1" stock with holes drilled at 11 1/2 " center to center make a good mockup strut with coilovers. On Stage II kits, use a 2" length of pipe or tube to immobilize the shock and support the car. Just before going to the alignment shop, install the springs and look for the lower arms to be level, plus or minus 1" according to your taste. You can cut up to one coil, figuring 1" drop per 1/2 coil. If you are still too tall (or too low), we can help you swap to another spring that is closer.





