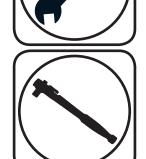




## Part # 11179590 - 1970-1981 F-Body Delrin Control Arm Bushings



#### **Recommended Tools**





### 1970-1981 F-Body Delrin Control Arm Bushings

# **Installation Instructions**

#### **Table of contents**

Page 2...... Included components and Hardware List

Page 3...... Bushing & Sleeves Deminsions

Page 4...... Bushing Installation Page 5..... Bushing Installation

IF YOUR CAR IS HAS AN OVAL BUSHING IN THE LOWER CONTROL ARM, IT WILL BE NECESSARY TO PURCHASE CONTROL ARMS THAT UTILIZE 2 ROUND BUSHINGS.

Ridetech has a Bushing Removal/Installation tool to help simplify the procedure, #85000009.







### **Major Components** .....In the box

Part #	Description				
70012383	Upper Control Arm Bushing Outer Shell				
70012385	Lower Control Arm Bushing Outer Shell				
70012386	Lower Control Arm Bushing Outer Shell				
70012384	Upper Control Arm Bushing Outer	Shell	4		
70012387	Lower Control Arm Bushing Outer	Shell	2		
70012420	Delrin Upper Control Arm Bushing - Upper				
70012421	Delrin Upper Control Arm Bushing - Upper				
70012422	Delrin Upper Control Arm Bushing - Upper				
70012423	Delrin Lower Control Arm Bushing - Lower				
70012424	Delrin Lower Control Arm Bushing - Lower				
70012425	Delrin Lower Control Arm Bushing - Lower				
90002522	Upper Bushing Inner Sleeve				
90002523	Upper Bushing Inner Sleeve				
90000516	Lower Bushing Inner Sleeve				
90000517	Lower Bushing Inner Sleeve				
90002263	Red Loctite				
Part #	Description	Usage	QTY		
99501006	1/2"-13 x 3 1/2" Hex Bolt	Lower Control Arm to Frame	4		
99502009	1/2"-13 Nylok Nut	Lower Control Arm to Frame	4		
99373005	3/8" Split Lockwasher	Upper Control Arm Shaft Bolts	4		
99561010	9/16"-12 x 3 1/2" Hex Bolt	Lower Control Arm to Frame	4		
99562006	9/16"-12 Nylok Nut	4			

### Getting Started.....

The Front Control Arms will need to be removed from the car. Refer to the Factory Service Manual for disassembly procedure.

This F-Body Bushing Kit contains: 3 different size Upper Control Arm Bushing Assemblies and 3 different size Lower Control Arm Bushing Assemblies. If your upper control arm has a Bushing with an outer sleeve that has raised dimples in it to space the bushing out, the new shell doesn't stick out, but does use a Bushing with a THICKER flange. The Outside Diameter of the Bushing, in the area that goes into the Control Arm, is the difference between the 3. Be sure to match the correct diameters with the correct locations. The lowers can have either a 1/2" or 9/16" ID Inner Sleeve. Both are supplied in the kit. The Chart on the next page will assist you in selecting the correct bushings to use. The chart has the deminsions of the shells, bushings and inner sleeves, along with the year ranges they fit.



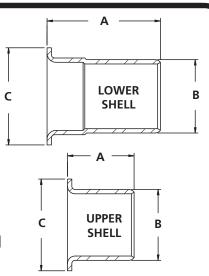


### **Bushing & Sleeve Dimensions**

#### **OUTER BUSHING SHELLS**

QTY	Part #	Α	В	С	YEAR FITMENT & QTY USED
UPPER OUTER SHELLS					
4	70012383	1.230	1.313	1.700	70-74 (4), 75-79 (2)
4	70012384	1.230	1.406	1.800	75-79 (2), 80-81 (4)
LOWER OUTER SHELLS					
2	70012385	2.100	1.359	1.800	70-72 (2), <b>73-74 (2)</b>
2	70012386	2.100	1.656	2.000	70-72(2), <b>73-74 (2)</b> , 75-79(2), 80-81 (2)
2	70012387	2.100	1.891	2.200	73-74 (2),75-79 (2), 80-81 (2)

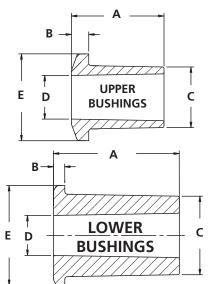
The 73-74 has 2 possibilities for the Front Bushing of the Lower Control Arm. The 2 possibilities are in **BOLD** in the chart.



#### **BUSHING DIMENSIONS**

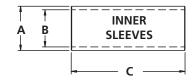
QTY	Part #	Α	В	С	D	E	YEAR FITMENT & QTY USED
UPPER BUSHINGS							
4	70012420	1.720	.320	1.123	.808	1.610	70-74 (4), 75-79 (2)
2	70012421	1.720	.312	1.213	.808	1.710	80-81 (2)
2	70012422	1.920	.512	1.213	.808	1.690	75-79 (2), 80-81 (2)
LOWER BUSHINGS							
2	70012423	2.330	.172	1.163	.740	1.730	70-72 (2), <b>73-74 (2)</b>
2	70012424	2.330	.208	1.453	.740	1.850	70-72 (2), <b>73-74 (2)</b> , 75-79(2), 80-81 (2)
2	70012425	2.330	.180	1.706	.740	2.200	73-74 (2), 75-79 (2), 80-81 (2)

The 73-74 has 2 possibilities for the Front Bushing of the Lower Control Arm. The 2 possibilities are in **BOLD** in the chart.



#### **INNER SLEEVES**

QTY	Part #	Α	В	С	YEAR FITMENT & QTY USED
UPPER INNER SLEEVES					
4	90002522	.818	.688	1.800	70-74 (4), 75-79 (2), 80-81(2)
2	90002523	.818	.688	2.190	75-79 (2), 80-81 (2)
LOWER INNER SLEEVES					
4	90000516	.750	.500	2.375	70-74 (4)
4	90000517	.750	.562	2.375	75-81 (4)







### **Delrin Bushing Installation**

There are several different ways that the Bushings can be removed from the Control Arms. If you have an Air Chisel, a Wide Flat Bit works well. If you don't have access to an Air Chisel, they can be removed by first, Drilling out the rubber with a Hand Drill and Drill Bit. With the Rubber removed, distort the Bushing Shell with a Hammer and Chisel and Knock it out. No matter the process used, the main objective is to **NOT** distort the Control Arm.

WE RECOMMEND MARKING DRIVER AND PASSENGER CONTROL ARMS AND CROSS SHAFTS. ALSO, MARK THE ORIENTATION OF THE CROSS SHAFTS.

**1.** Measure the Outside Width of the Control Arms and write it down before starting Bushing Removal. You will use this Dimension to check the Control Arms after the new Delrin Bushings are installed.

The Cross Shaft must be put in place before installing the Bushing Shells in the Upper Control Arm.

Just like Bushing Removal, there are several ways the Delrin Bushing Assemblies can be installed. No matter the method used, the Control Arm needs to be **SUPPORTED** to keep from distorting the Control Arm. We recommend cutting spacers to go inside the Control Arms when using a Press to install the Bushings. We have used several different methods to install the Bushing Assemblies, we are going to cover the one that worked best for us. When installing the Bushings, the Outer Shell will be installed in the Arm by itself. Next, Press in the Delrin Bushing, followed by the Inner Sleeve. **WE DO NOT RECOMMEND INSTALLING THE BUSHINGS COMPLETELY ASSEMBLED.** 

**Note:** The Delrin is self-lubricating, no lubricant is needed.

Ridetech has a Bushing Removal/Installation tool to help simplify the procedure, #85000009.



2. Disassemble the Bushing being installed. If installing Bushings in the Upper Control Arm, insert the Cross Shaft before installing any Bushings. Support the Back Side of the Flange the Bushing is being Installed in. Use a STIFF piece of Metal clamped in a Bench Vise for the Lower Control Arms (Figure 2). The Upper Control Arm can be supported by either the same piece of Metal or by the Bench Vise with the Jaws opened wide enough to let the Bushing Shell pass through (Figure 3).





### **Delrin Bushing Installation**



- **3.** Use another Piece of Metal or Strong Wood to Drive the Outer Shell into the Control Arm until the Shell stops against the Control Arm.
- **4**. Press the Delrin Bushing into the Bushing Shell followed be the Inner Sleeve. DO NOT DRIVE IN WITH HAMMER.
- **5.** Reinstall the Outer Washer using the OEM Bolt, but replace the Lockwasher with the supplied Lockwasher. Tighten Hardware to eliminate any gaps between the Bushings and Cross Shaft.

**6.** Reattach Control Arms to Car. Use the OEM Hardware to attach the Upper and the Supplied  $1/2"-13 \times 3 \cdot 1/2"$  or  $9/16"-12 \times 3 \cdot 1/2"$  Hex Bolts and Nylok Nuts to Install the Lower Control Arms.

**5** 

812-482-2932