
E24FSB001 Installation Instructions

Compatibility

The E24FSB001 front sway bar bracket replacement kit is compatible with BMW e28 chassis based cars, including 5 series and 6 series from 1984 up to 1989. Automatic vehicles utilize an oil cooler line mount that will have to be relocated prior to installation.

Replacement bushings may be ordered from Energy Suspension (<http://energysuspension.com/>), see part numbers at the end of this document. These front sway bar brackets will accommodate sway bars up to 1 3/8" using standard Energy Suspension front sway bar bushings.

Included Parts

- 2 - frame rail brackets
- 4 - 17mm M10 bolts and washers
- 2 - Polyurethane bushings and retaining bracket
- Bushing Grease

Required Tools

- Welder capable of welding 1/8" mild steel
- Grinder with cut off and grinding wheels, or die grinder with cut off wheels and carbide cutters
- Tape measure, permanent marker
- Blue Loctite (medium strength)
- Self etching primer and paint

Installation

1.	Properly secure the front of the vehicle off the ground using jackstands or a lift.
2.	Remove front wheels, front sway bar and bushings. Sway bar end links may be left in place if desired. Remove the securing nut to the upper control arm, this will make additional space for cutting tools on the back side of the frame rail. The bolt may be partially pushed out.
3.	If an automatic transmission, note that the oil cooler lines on the driver side will be secured to the frame rail using a second bracket further forward from the sway bar bracket but behind the control arms. These lines must be rerouted before installation can continue. If this cannot be done, do not continue.
4.	Temporarily remount old sway bar bushings and bracket without the sway bar. Draw a vertical line on the frame rail through the center of the bushing. This will aid in alignment of the new bracket and bushings (see pictures below).
5.	Using cut off wheels, remove driver and passenger old sway bar mounts and transmission cooler line mount from the frame rail (if present). Grind all old bracket metal and welds down to the frame rail for a flush surface. Be careful not to cut into the frame rail. Brake, fuel, and clutch hydraulic lines are located in the vicinity!
6.	Thread the two 17mm M10 bolts into the new mounts without any bushing brackets or washers. The bolts ends should protrude slightly on the inside. These will be used to space the bracket off of the frame rail.

Position bracket onto frame rail, larger end facing the rear of the vehicle. Check forward-backward alignment using previous mark. The bracket should be spaced off the frame rail approximately $\frac{1}{2}$ " to $\frac{3}{4}$ ".
7. If necessary, <i>slightly</i> bend new bracket tabs inward until bracket can stay held on the frame rail and the tabs are flush with the frame rail.
8. Tack weld bracket in place.
9. Loosely reinstall all hardware, sway bar, end links, and bushings to check fit.
10. At this point it is recommended, but not required, to temporarily reassembly the front control arm and new sway bar bushings in order to lower the car to ensure sway bar end correctly clears control arms.
11. Weld new bracket in place around all four protruding tabs.
12. Prime and paint new brackets.
13. Grease sway bar bushings with included grease. Tighten sway bar bracket bolts to 30 ft lb using blue Loctite on the threads. Do not use any additional washers or lock washers other than supplied hardware. Doing so may cause insufficient thread engagement.
14. Reattach upper control arm, do not fully tighten.
15. Lower vehicle, tighten upper control arm bolt when suspension is loaded.

Installation Photos

Shown before welding, properly positioned. Note vertical alignment mark.



Top corner of bracket tab will be approximately $7\frac{1}{2}$ " from forward tip of frame cross brace bracket.



Corner of bracket will tuck under control arm bracket when properly positioned.



Replacement Bushing Part Numbers

The sway bar bushings are Energy Suspension parts, and can be reordered if different size sway bars are to be used.

Diameter	Energy Suspension Part Number
7/16" / 11mm	9.5101
1/2" / 13mm	9.5102
9/16" / 14mm	9.5103
5/8" / 16mm	9.5104
11/16" / 17.5mm	9.5105
3/4" / 19mm	9.5106
13/16" / 20.5mm	9.5107
7/8" / 22mm	9.5108
23mm	9.5115
15/16" / 24mm	9.5109
1" / 25mm	9.5110
1 1/16" / 27mm	9.5111
28mm	9.5130
1 1/8" / 28.5mm	9.5112
1 1/4" / 31.5mm	9.5113
32mm	9.5116
1 5/16" / 33mm	9.5114