Instruction Guide

Rear Coilover Conversion Kit
77-87 G-Body

Speedtech PERFORMANCE

CHASSIS - SUSPENSION - PRO TOURING - AUTOCROSS - DRAG RACING - CUSTOM BUILDS

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Figure 1: 1987 Grand National, features our G-Body suspension; picture by: Blake Foster

Congratulations on the purchase of your new Speedtech Performance ExtReme rear coilover conversion kit. Use only approved and appropriately rated jack and jack stands, and be sure to take all safety precautions required to complete the job safely and correctly. If you have uncertainties, seek the assistance of a highly qualified workshop to assist you.

Read and understand all instructions thoroughly before you begin. Your main assembly and set up of your new ExtReme rear coilover conversion kit can be done in a home garage with hand tools.

Speedtech enjoys seeing the progress our customers are making as they work through their builds. Join the group, Team Speedtech, on Facebook and share your pictures and your story.

Speedtech Performance sends you best wishes for your project!

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1.0 GENERAL INFORMATION

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1.1 THIS GUIDE

Thank you for purchasing your new Speedtech Performance ExtReme rear coilover conversion kit. Read through all instructions thoroughly before beginning and take all safety precautions required to do the job carefully and correctly. If you have uncertainty, seek the assistance of a highly qualified workshop.

The following instructions are intended for professional installers and are guidelines only. Speedtech Performance assumes no responsibility for the installation of any of its products installed by others. All products are intended to be installed by qualified professionals.

1.2 OVERVIEW

These instructions outline the G-Body Rear Coilover Conversion Kit. Photos in the instruction process may vary slightly from your exact operation.

Speedtech recommends that you inspect all of your car's suspension components prior to installation of our parts, such as bushings and brake lines which may be worn and could cause adverse effects. Replace parts as necessary. It is also suggested you replace the upper axle housing bushings with factory replacement rubber bushings.

The Speedtech coilover bracket is designed to slip over and bolt on to the existing shock bracket.

NOTE! For determining left and right sides, remember the shock mount tabs are located inward.

1.3 TOOLS

Installation of the Speedtech Performance G-Body rear coilover conversion kit can be done on the floor with simple hand tools.

Additional things to have before you start:

- Socket / Wrench
- Floor Stands
- Floor Jack
- Drill with bits

2.0 CHECK IN PARTS AND HARDWARE

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2.1 CHECKING IN THE ORDER

Check in your order as soon as possible. To check in the order, Speedtech has provided tables which can be used as check lists, as displayed in figure 3. All bolts and nuts are NF unless otherwise noted. Hardware comes in several boxes. If you discover anything missing from your order, call your authorized dealer as soon as possible.

2.2 CHECK IN TABLES

Non-Currie

X	#	Description	Size
	2	Aluminum Shock Adapter	
	4	Upper Bracket Mount -Bolt	3/8 x 1 3/4 NC
	2	Upper Bracket Mount -Bolt	7/16 x ¾ NF
	4	Trailing Arm Mount -Bolt	12 x 100MM
	2	Shock Adapter Mount -Bolt	5/8 x 1 NC
	2	Shock Adapter Mount -Bolt	5/8 x 4 ½ NF
	2	Nylock Nut	7/16
	4	Nylock Nut	3/8
	2	Nylock Nut	5/8
	2	Nylock Nut	12MM
	8	Washer	3/8
	2	Washer	7/16
	4	Washer	5/8
	4	Washer	12MM

Figure 2: Check in tables including amounts, description, and sizes

3.0 GETTING STARTED

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3.1 LEVELING AND SUPPORT

WARNING! The vehicle should be on a level surface before you start.

First, jack up and properly support the vehicle's frame. The suspension should be at drive height when installing the bar. If the car is on a lift and the suspension is in droop when you install the kit, it will not line up properly when back on the ground. The sway bar brackets will all need to be testfit into place before final installation to achieve proper alignment of the bar and that no binding is experienced during the suspension's travel.

Remove the rear wheels if needed for extra room to work. With the rear axle supported, remove one side's shock and the rearward part of the lower control arm. Carefully lower the rear axle to the point that you can remove the coil springs.

NOTE! Doing one side at a time keeps the rear axle stable in position.

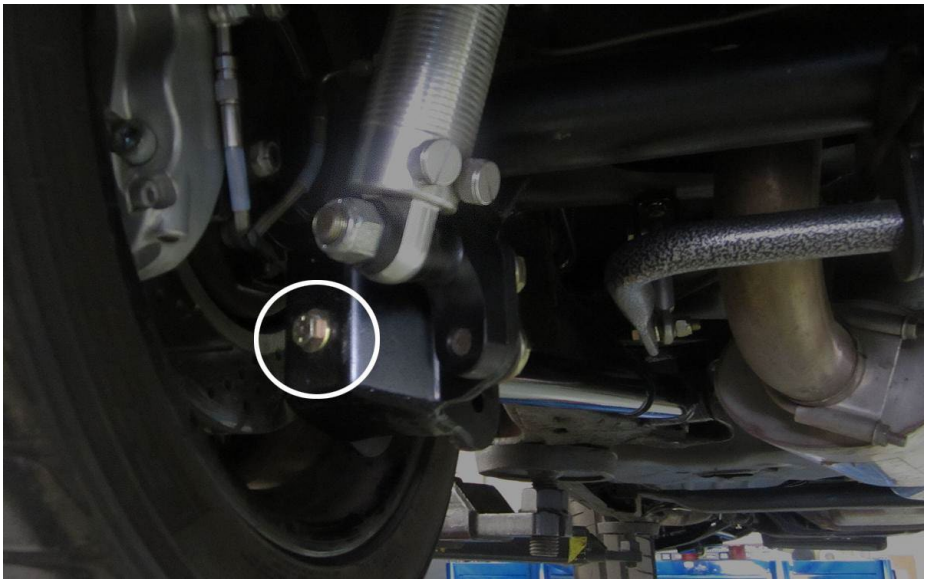

Figure 3: Bolting the washer and nylock nut

4.0 INSTALLATION

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4.1 FACTORY SHOCK MOUNT

Bolt the 7/16 x 1 ¼ bolt, 7/16 washer, and 7/16 Nylock nut through the back side hole where the factory shock bolt used to be. Do not fully tighten at this time.

4.2 BRACKET

Your new bracket has three possible placements for the trailing arm so that you can adjust instant center. For stock specs, use only one 12x100 mm bolt, 12 mm washer, and nylock nut, and place the trailing arm back in the factory location. To adjust the arm downward, use one 12x100 mm bolt, 12 mm washer, nylock nut and the 1/2" sleeve in the factory trailing arm mount location. Then use the extra 12x100 mm bolt, 12 mm washer, nylock nut bolt to attach the arm through one of the remaining lower holes.

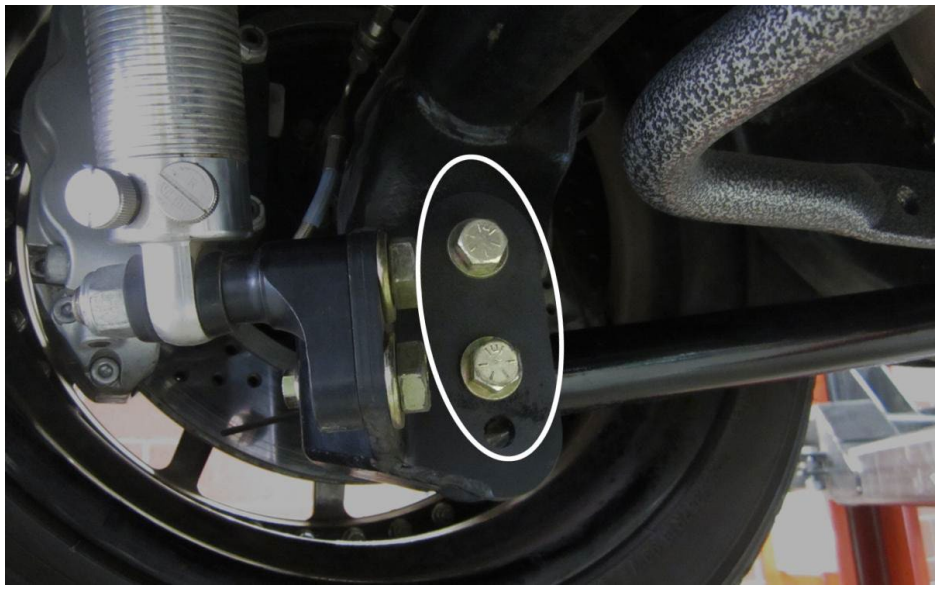

Figure 4: Placement of brackets

4.3 SHOCK ASSEMBLY

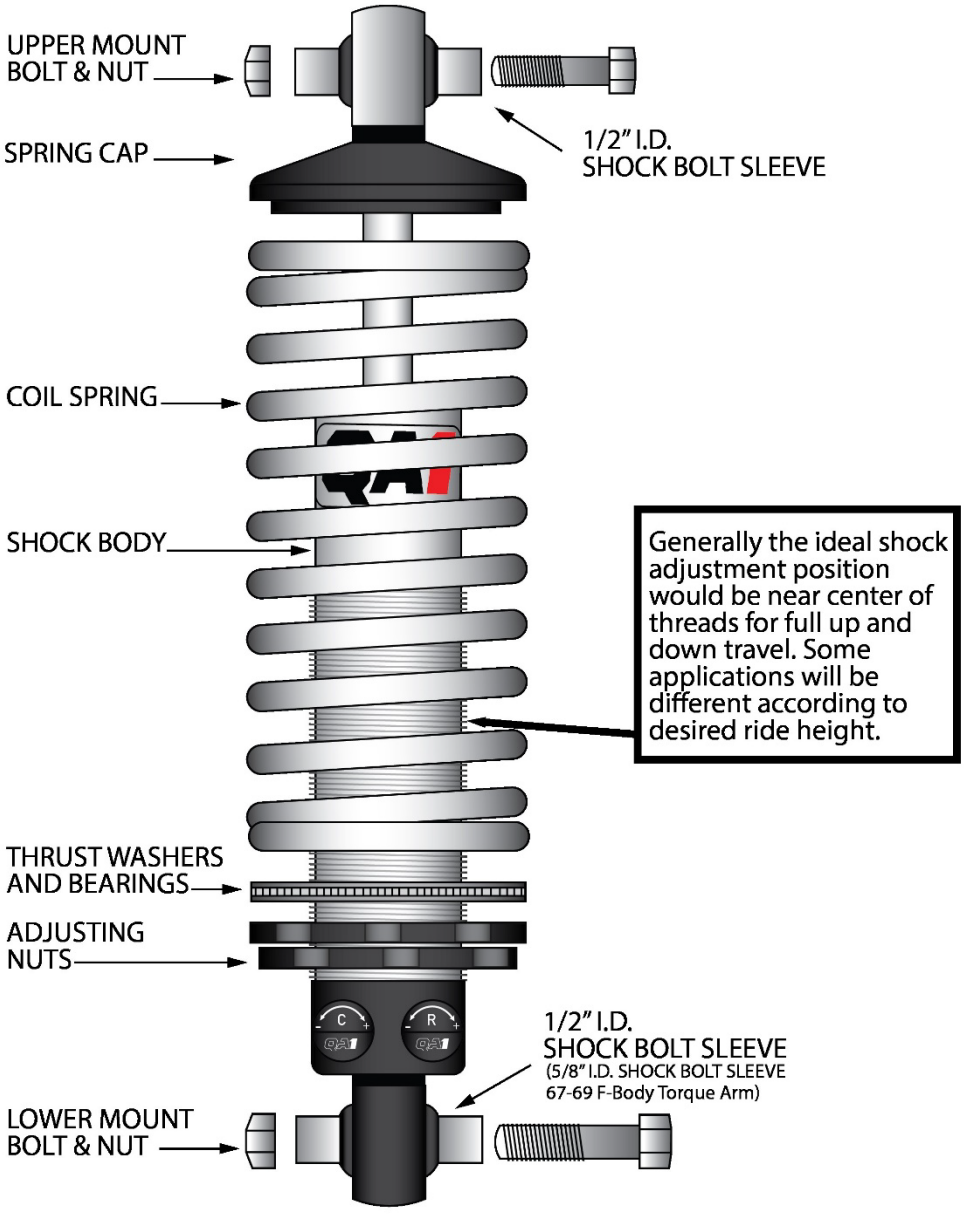

Figure 5: Assembly of coilover shocks

4.4 ASSEMBLY CONTINUES

The 5/8 x 4 ½ and 5/8 x 1 bolts attach your shock adapter to the bracket. Placing the bracket as pictured is a good starting point. If you want additional ride height drop, simply flip the adapter vertically 180 degrees so that the longer bolt goes through the lower hole in the bracket.

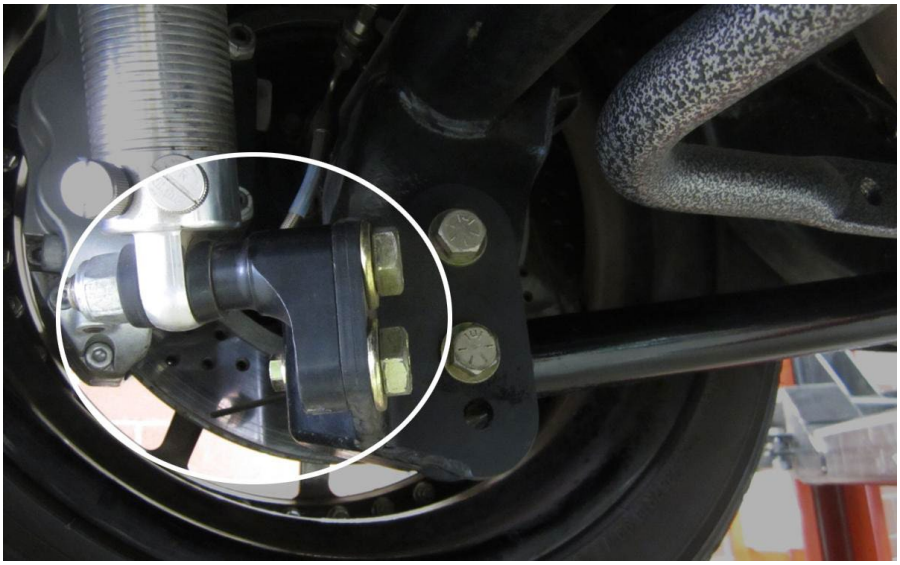

Figure 6: Placing the bracket

4.5 UPPER INSTALL

Attach the upper portion of the shock with the T-bar bracket in the factory shock mounting position using the 3/8 bolts and washers.

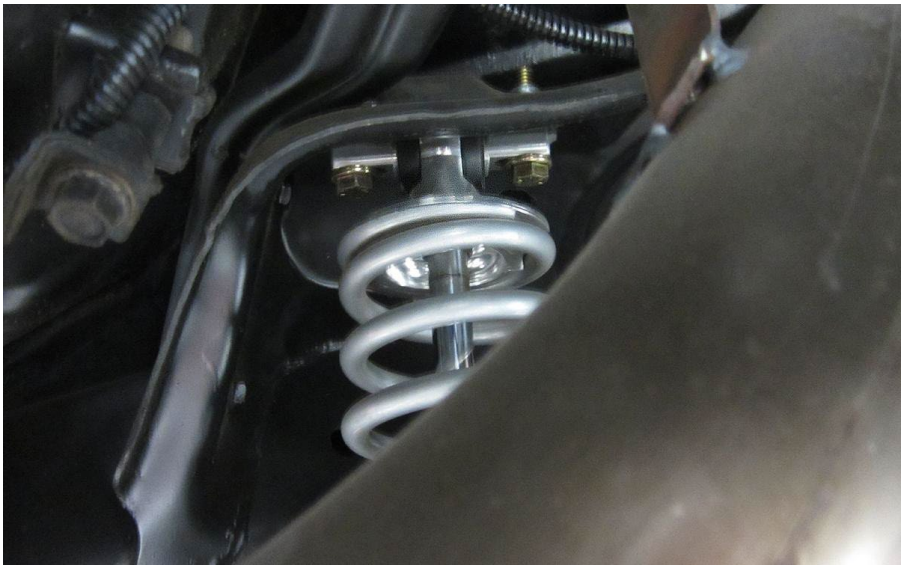

Figure 7: T-bar backet in the shock

4.6 BOLTS

At this time, be sure all bolts are tight.

4.7 REPEAT

Finally, repeat all steps.

5.0 RIDE HEIGHT / ALIGNMENT

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Tighten all loose suspension bolts and double-check all bolts to ensure they are all tight. It is recommended you fill all grease fittings at this time. Speedtech suggests using Permatex Ultra Slick Synthetic Grease, but any high-quality chassis grease will do. For your Sweet power rack and pinion we recommend using Sweet or Jones brand full synthetic power steering fluid for best performance and to avoid overheating standard type fluids during performance driving situations.

With the weight off the rear suspension, support the rear axle and set the initial ride height according to manufacturer recommendations. Replace wheels and tires and carefully lower the vehicle back onto the ground. Next, fine tune your ride height adjustments.

Wheel alignment may not be necessary because you have used factory mounting points as a base for this kit. If you have installed adjustable trailing arms and/or changed front suspension components at the same time, Speedtech recommends having an alignment performed by a reputable source familiar with performance-based alignments on older vehicles.

When finished, take the vehicle to a competent professional alignment shop to have an alignment performed.

Note! Use alignment specifications below, not alignment shop pre-programmed factory specifications.

These specifications are only suggestions and may need additional changes to achieve the optimum settings for your driving style or situation, see figure 8.

Daily Driving, Street Performance Specifications

Driver Side	Passenger Side
4 Degrees positive Caster	4 ½ Degrees positive Caster
0 to ½ Degree negative Camber	0 to ½ Degree negative Camber
3/ 32 Total Toe-in	3/ 32 Total Toe-in

Aggressive Track Alignment Specifications

Driver Side	Passenger Side
5 ½ Degrees positive Caster	6 Degrees positive Caster
½ to 1 Degree negative Camber	½ to 1 Degree negative Camber
3/ 32 Total Toe-in	3/ 32 Total Toe-in

Original Alignment Specifications

NOTE! For reference purposes only. Do not use these specifications.

Driver Side	Passenger Side
½ Degree positive Caster	½ Degree positive Caster
¼ to ½ Degree negative Camber	¼ to ½ Degree negative Camber
1/8 Total Toe-in	1/8 Total Toe-in

Figure 8: Alignment specifications

This concludes the instructions for the rear coilover conversion kit.

6.0 CONGRATULATIONS

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Congratulations on completing your project! We know you will get many years of enjoyment from your project. Please join the group, Team Speedtech, on Facebook. Team Speedtech is a community of customers, dealers, and factory employers that have a passion for pro touring muscle cars and are using Speedtech Performance products. You can ask questions and get advice from the group members and share your experience. Everyone enjoys seeing the videos and pictures during the progress of your project and Speedtech encourages you to share them!

Thank you for choosing Speedtech Performance and entrusting us with your rear coilover conversion needs for your custom muscle cars.

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