

# INSTALLATION GUIDE



## 6262

### Avenger Splined Anti-Roll Bar



### PARTS LIST

**PRIOR TO INSTALLATION:**

Use the following parts list to verify you have received all components required for installation.

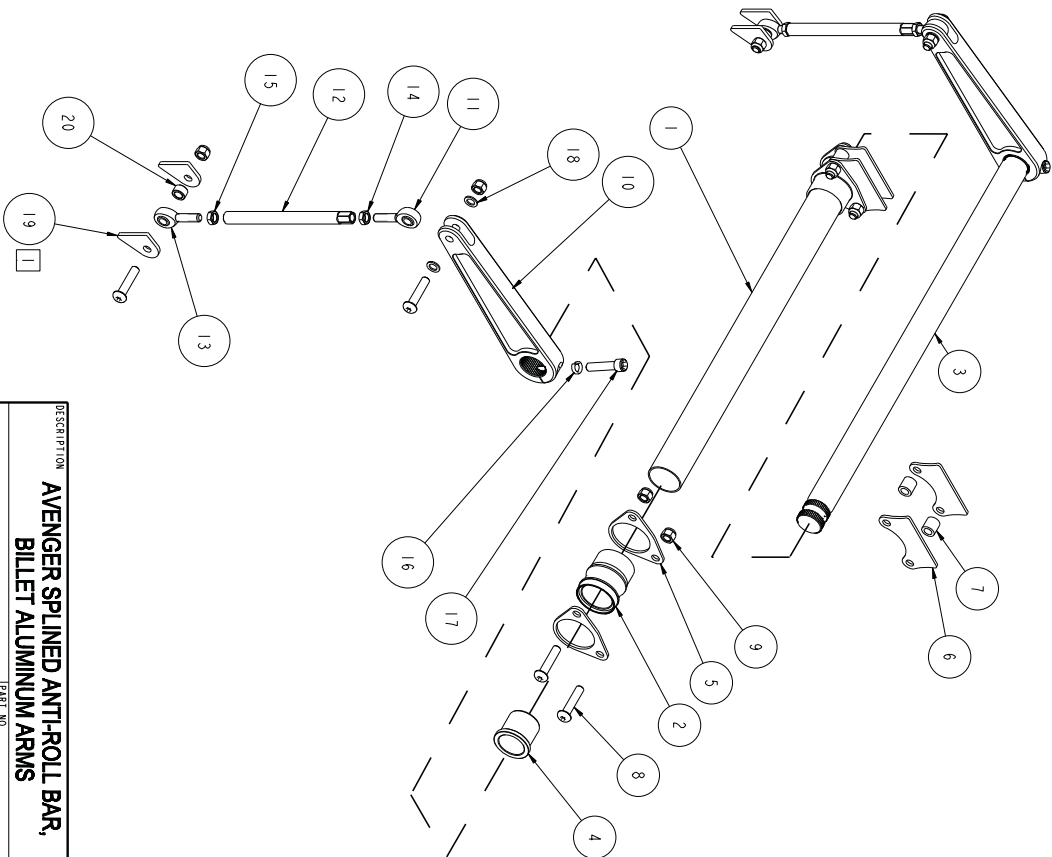
Item	Qty	Part Number	Description
1*	1	A26-065-0xx.xxx	Cross tube 4130 1-5/8x.065, 12.280 to 30.280" long
2	2	1170	Bearing housing for 1.50"-OD flanged bearing and 1-5/8" tube
3*	1	1171-xx.xx-1.25	Anti-roll bar 1.25 OD, 48-spline flat end, 18 to 36" long
4	2	3155-1.260-4848	Flanged bearing 1.260 ID x 1.5 OD x 1.5" long
5	4	2728	Bearing-housing bracket
6	4	2729	Chassis mounting tab
7	4	D10.120-000.625	Chassis-mount sleeve 5/8 x .120 wall x .625" long
8	8	3104-038C1.75C	Button-head 3/8-16 x 1-3/4" cap screw
9	8	3101-038-16C	Locknut 3/8-16 nylon insert
10	2	1468	Anti-roll-bar billet arm, 48 spline, 8.2" center length
11	2	3126-038x038-L	4130 Teflon®-lined rod end 3/8" left hand male
12	2	1056	Adjuster rod 7" anti-roll bar
13	2	3126-038x038-R	4130 Teflon®-lined rod end 3/8" right hand male
14	2	3102-038-24LY	Left-hand jam nut 3/8-24
15	2	3102-038-24RC	Right-hand jam nut 3/8-24
16	2	3108-038H-C	Lockwasher 3/8" high collar
17	2	3103-038C1.75C	Socket-head 3/8-16 x 1-3/4" cap screw
18	4	3109-038-S-2-Y	Aircraft washer 3/8"small OD
19	(4)	2121	Housing-mount clevis tab (optional kit 6221)
20	2	1055	Sleeve 5/8 x .120 wall x .375" long

**Note:**

\* Part length is specific to anti-roll-bar width ordered.

NOTES:  
 OPTIONAL ITEM

ITEM QTY	PART NO.	DESCRIPTION
1	A26-065-018-280	CROSS TUBE, ANTI-ROLL BAR, AVENGER, 24"
2	1170	HOUSING, Ø1.50 FLANGED BEARING, Ø1 5/8 TUBE, .885 SHOULDER
3	1171-24-00-1.25	ANTI-ROLL BAR, 1/4-48 SPLINE x 24 LONG
4	3155-1-260-4848	BEARING, Ø1.73 OD x .20 FLANGE, Ø1.260 ID x 1.505 OD x 1.50 LONG
5	2728	HOUSING RING BRACKET, ANTI-ROLL BAR BUSHING
6	2729	CHASSIS MOUNTING TAB, 4130, ANTI-ROLL BAR
7	D10-120-000-625	SLEEVE, Ø5/8 x .120 WALL x .625
8	3104-038C1-75C	BUTTON HEAD CAP SCREW 3/8-16 x 1 3/4, CLEAR ZINC
9	3101-038-16C	LOCKNUT 3/8-16, GRADE 5, NYLON INSERT, CLEAR ZINC
10	1468	ANTI-ROLL STRAIGHT ARM, 1/4-48 SPLINE, 8.20 LONG
11	3126-038X038-L	ROD END 3/8 4130 LT MALE JMX6
12	1056	ADJUSTER, 7.0 x 3/8-24, ANTI-ROLL BAR
13	3126-038X038-R	ROD END 3/8 4130 RT MALE JMX6
14	3102-038-24LY	JAM NUT, 3/8-24 LEFT, YELLOW ZINC
15	3102-038-24RC	JAM NUT, 3/8-24 RIGHT, CLEAR ZINC
16	3108-038H-C	HIGH COLLAR LOCKWASHER, 3/8 STEEL, CLEAR ZINC
17	3103-038C1-75C	SOCKET HEAD CAP SCREW, GRADE 8 3/8-16 x 1 3/4, CLEAR ZINC
18	3109-038-S-2-Y	AIRCRAFT WASHER 3/8 x .062 THICK
19	2121	CLEVIS TAB Ø3/8 HOLE
20	1055	SLEEVE Ø5/8 x .120 DOM x .375



DESCRIPTION <b>AVENGER SPLINED ANTI-ROLL BAR,          BILLET ALUMINUM ARMS</b>	
Chassis Works & Chassisworks Inc. 6961 YOUNGER CREEK DRIVE SACRAMENTO, CA 95828 (916) 388-0288 FAX: 388-0286	PART NO. <b>6262</b> DMC: 916262

This anti-roll bar can be used with the Eliminator II (6246) and Avenger (6206 or 6260) 4-link systems. Installation on other rear suspensions requires the optional adjuster-rod tab kit (6221); refer to Item 19 (2121) on the exploded drawing. The 4-link, locator, and shocks must be completely installed with the rear end at ride height and centered in the chassis before starting. This anti-roll bar requires considerable space above the rear end. Frame modification may be required.

### **Bearing Housing Weld Assembly**

1. Assemble bearing-housing brackets and bearing housings first. Slide one of the bearing-housing brackets (2728) over the side of the bearing housing with the longer machined end (inner side). Make sure it is tight against the shoulder. Tack weld the ring to the bearing housing in three places.
2. Place a second bracket over the opposite end of the bearing housing. Use one flat side of the ring to ensure the two rings are clocked the same. Push the ring tight against the shoulder and tack weld it in three places.
3. Finish welding the rings to the bearing housing. Repeat this for the second bearing housing and then set aside to completely cool.
4. Slide one of the housing assemblies over the 1-5/8 x .065" cross tube and tack weld it in three places along the outside-diameter joint. Make sure the bearing housing is tight against the end of the cross tube. A pipe clamp can be used for this step.
5. Finish welding the first bearing housing to the cross tube, and then let the assembly completely cool. **DO NOT WELD THE SECOND BEARING HOUSING TO THE TUBE AT THIS TIME.**

### **Chassis-Mount Weld Assembly**

6. Place the 5/8"-long chassis-mount sleeves between two of the chassis mount tabs. Use 3/8-16 button-head bolts (Item 8) and 3/8-16 standard nuts (not included) to hold them. Weld the spacers to the tabs. Repeat this for the second set.

### **Verify Cross-Tube Assembly Fit**

7. Push one of the billet arms over the splined end of the anti-roll bar until it is flush along the outside edge. Secure it with a 3/8-16 x 1-3/4" socket-head cap screw.
8. Press the flanged bearing into each of the bearing housings.
9. Bolt a chassis-mount assembly to each of the bearing housings and secure with the 3/8-16 x 1-3/4" button-head bolts and locknuts.
10. Slide the cross-tube assembly over the anti-roll bar followed by the unwelded bearing-housing assembly. Make sure the flanged bearing is tight against the installed billet arm.
11. Prior to installing the second billet arm, set the assembly on a flat surface to make sure the arms are clocked the same and then secure with a 3/8" socket-head cap screw.
12. Slide or tap the unwelded bearing-housing assembly outward until it contacts the billet arm. Each bearing-housing assembly must be seated tightly against the billet arms to ensure there is no side-to-side movement during operation.
13. Set the complete assembly on a flat surface. The chassis mount tabs and billet arms should be clocked the same on both ends of the assembly. Once correct positioning has been verified, tack weld the unwelded bearing-housing assembly to the cross tube.
14. Unbolt the billet arm from the tack-welded end of the cross tube and remove the flanged bearing from the bearing housing before finish welding around the outside-diameter joint.
15. Once the parts are cooled, reinstall the flanged bearing and reassemble the anti-roll bar with arms into the cross-tube assembly. Use the 3/8" high-collar lock washers on socket-head caps screw at this time.

### **Adjuster Rod Assembly**

16. Screw a 3/8" rod end with a jam nut into each end of the adjuster rod. The left-hand threaded end of the adjuster rod is indicated by the machined hex.

17. Install the adjuster rod assembly onto the rear-end housing clevis with 3/8"-diameter hole. If needed, use the 3/8"-long housing-mount sleeves to take up the excess gap.

### **Position the Anti-Roll Bar**

18. With the billet arms pointing rearward, place the anti-roll-bar assembly above and forward of the rear-end housing at its approximate installation position while the adjuster rods are attached to the billet arms. Use the 3/8-16 x 1-3/4" button-head bolts, aircraft washers and locknuts to secure the adjuster rods to the arms.
19. The cross tube will need to be repositioned at this time to ensure the arms are level to the ground with the suspension at the ride-height position. If needed the links can also be shortened from the right-hand-threaded end and re-tapped with a 3/8-24 NF tap.
20. Clamp the anti-roll-bar assembly to the frame, crossmember, or other suitable mounting area. **The chassis-attachment weld area must be strong enough to adequately support the anti-roll-bar assembly while under load.** Additional cage or frame members may have to be added.
21. The chassis-mount tabs may have to be ground to achieve a close fit against the chassis. Once correctly fit, grind the chassis weld area clean, and then tack weld the tabs to the chassis.

### **Verify Clearance and Travel**

22. Remove the springs and rubber bumpers from the coil-over shocks and reattach the shocks.
23. Move the rear end through its total range of travel to verify that nothing binds all moving components have adequate clearance.
24. Verify that the arms do not go over center when the suspension is fully extended.
25. After you are sure there is no binding or interference, unbolt the assembly from the tabs and finish welding the mounting tabs to the chassis.

### **Final Adjustment**

26. The car must be 100% complete, at race weight with the driver in the car, and have the proper tire pressure. Make sure the vehicle is on a level surface. Disconnect one lower end of the anti-roll-bar adjuster rod and set the suspension links to zero preload. Adjust the detached adjuster rod to be able to easily insert the bolt without loading the anti-roll bar.
27. Anti-roll-bar equipped cars usually require almost no suspension-link preload. **DO NOT USE THE ANTI-ROLL BAR TO PRELOAD THE CHASSIS.** If the chassis does not launch straight, add preload using the suspension links as normal.

### **WARRANTY NOTICE:**

There are NO WARRANTIES, either expressed or implied. Neither the seller nor manufacturer will be liable for any loss, damage or injury, direct or indirect, arising from the use or inability to determine the appropriate use of any products. Before any attempt at installation, all drawings and/or instruction sheets should be completely reviewed to determine the suitability of the product for its intended use. In this connection, the user assumes all responsibility and risk. We reserve the right to change specification without notice. Further, Chris Alston's Chassisworks, Inc., makes **NO GUARANTEE** in reference to any specific class legality of any component. **ALL PRODUCTS ARE INTENDED FOR RACING AND OFF-ROAD USE AND MAY NOT BE LEGALLY USED ON THE HIGHWAY.** The products offered for sale are true race-car components and, in all cases, require some fabrication skill. **NO PRODUCT OR SERVICE IS DESIGNED OR INTENDED TO PREVENT INJURY OR DEATH.**

Chris Alston's Chassisworks  
8661 Younger Creek Drive  
Sacramento, CA 95828  
Phone: 916-388-0288  
Technical Support: sales@cachassisworks.com

