

## 1.00 Uniball Performance Upper Arm Instructions

Nissan Titan 2wd/4wd 2004-2015

### PARTS SUPPLIED

QTY	Description	
8	Polyurethane pivot bushings	A
4	7/8" OD x 9/16" ID x 2.15" L sleeves	B
4	90 degree zerk grease fittings (self tapping)	
2	9/16" tapered uniball spindle adaptors	E
2	9/16" upper uniball spacers	D
2	9/16-18 x 4.5" Hex G8 bolts	
2	9/16 SAE G8 flat washers	
2	9/16-18 stover lock nuts	
4	Grease packets	
4	Camburg 8.5" Stickers	

Thanks for purchasing a set of our Camburg 1.00 uniball performance upper a-arms for your vehicle. Please follow all instructions. If you are not installing these yourself have a qualified shop do so. These arms are designed for 1-3" of lift from coilovers and to be used with stock OEM spindles or Camburg performance spindles. These are NOT designed to be used with cheap spacer type lifts. Make sure to check the parts list to make sure you have every component prior to starting. Camburg Engineering has made every attempt to insure you receive the highest quality components in the most complete manner. This is a guide to help you through the process with recommended torque specs. It's your responsibility to ensure parts are being installed correctly using the correct tools and procedures.

#### **Tools & Supplies Required**

Eye protection | Jack | Jack Stands | 2-3 lb. mini sledge hammer  
19mm socket & wrench | 21mm socket & wrench | 13/16" socket  
7/8" socket | 1/4" wrench | Torque wrench | Brake cleaner  
Anti-seize | Red Loctite

#### **1.0 Setup**

Park the vehicle on level ground and set the parking brake and chock the rear wheels. Jack up the front end until the tires are off the ground. Place jack stands under the frame rails and set down. Jack up the driver side lower arm to only raise the tire off the ground, remove the wheel and keep jack under lower a-arm to support the suspension.

#### **2.0 Removal**

Using a 21mm socket, loosen the nut from on the upper ball-joint where it connects to the spindle but do not fully remove. With a mini sledge hammer, strike the top of the spindle numerous times to release the ball-joint tapered stud. This can be a little difficult since it's a press fit, heating up the spindle to get it to expand will help. Once the ball joint releases from the spindle, then remove the nut. This will allow you to position the upper arm and spindle out of the way. Use a 19mm socket & wrench to loosen and remove the OEM upper a-arm bolts. Remove the stock upper arm. If there are any raised points in the factory mounts where the bushings will ride, you will need to grind them flat before installing.

#### **3.0 Pre-installation**

Using a 1/4" wrench install the self-tapping zerk fittings into the Camburg arms. Do not bottom out the fittings into the arms. The zerk fitting is two parts that thread together, you may need to remove the nipple when installing. Position them pointing outward for grease gun access. Now press the polyurethane bushings into the arms. Using the supplied bushing grease, apply grease onto the OD of the inner pivot sleeves and press into the bushings.

Wipe excess grease onto outer bushing face and apply additional grease if needed. See diagram on other side for reference.

#### **4.0 Installation**

Install the driver side Camburg upper arm into the frame using the original hardware in the same orientation as it was removed. You may need to slightly grind/file the bushing hat/flange for clearance to properly fit. To insure you're installing the correct arm, the zerk fittings and pivot gussets will be on top, the uniball snap-ring below and the longer a-arm tube towards the front of the vehicle. Our arms are built with higher precision and tighter tolerances than the factory arms, so it will be a tighter fit into the frame. You may need to pry the outer tabs out very slightly to make it easier to install. When the stock arms are tightened from the factory it bends the tabs slightly in. With the bolts pushed all the way through, clean the threads with brake cleaner and apply a little red Loctite to the nut area. Use a 19mm wrench and socket and torque to 105 ft/lbs.

Inspect and clean the tapered hole in the spindle/knuckle. Insert the tapered lower uniball spacer into the uniball. Then install the upper spacer into the top of the uniball making sure both spacers are fully seated. If not, damage will occur in the following steps. Install the 9/16" hex bolt through the spacers and uniball and attach the upper arm to the spindle by swinging it down to the spindle with some finesse. You may need to jack up the lower arm and move the uniball joint. The tapered spacer should sit almost flush with the top of the spindle before tightening. Make sure the lower spacer did not pull out slightly from the uniball or damage will occur as the spacer can get caught on the bearing race and/or snap ring. Install the 9/16" washer and stover lock nut with a small amount of red Loctite onto clean threads. Using a 13/16" socket and 7/8" socket, torque to 120-125 ft/lbs. Do not over-tighten or use an impact gun.

**Repeat steps 1 through 4 to install passenger side arm**

#### **5.0 Alignment**

You will need to have your vehicle aligned by a qualified shop. Additional caster is built into the Camburg arms to correct alignment issues that are inherent with lifting the vehicle. Have your alignment shop increase/maxout positive caster, then set camber and toe to factory OEM specifications. Having an increase in caster helps with straight line stability and cornering precision for performance driving on and off-road.

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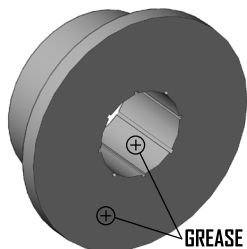
### 6.0 Maintenance & Care

Uniballs are precision parts with tight tolerances which can lead to occasional noise when they become dirty. Occasionally wipe off the top and underside of the uniball with a clean rag to remove road grime and dirt. Cleaning and lubricating them with WD-40 or a PTFE dry film lube like "Tri-Flow" can minimize any noise from stiction. Do not use harsh chemicals or grease/oil that attracts dirt to clean & lubricate the uniball as it will damage and wear the PTFE liner that is bonded internally. Over time the pivot bushings will also need to be cleaned and lubricated. Use grease that's designed specifically for polyurethane bushings. Not using the correct grease can cause the bushings to squeak abnormally and wear faster. The best method to grease the bushings is to remove the arms from the vehicle, disassemble, clean and lubricate. Some grease guns operate at 1300 psi. and can damage the bushings applying too much pressure. Neglecting care and upkeep will wear parts out faster.

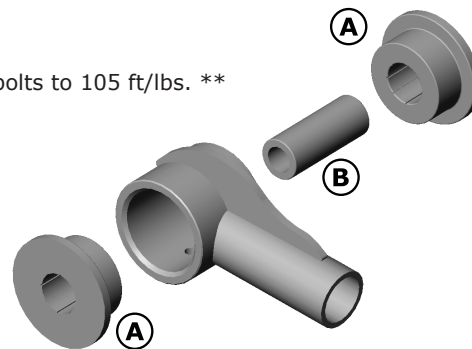
Inspect and re-torque all hardware and components after 500 miles and whenever using the truck off-road.

### Notes

Recommended tire size: 32-33"  
Recommended wheel size: 16-17" x 8-9"  
Maximum wheel backspacing = 4.75"



\*\* Torque bolts to 105 ft/lbs. \*\*



\*\* Torque 9/16" bolt to 120-125 ft/lbs. \*\*

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