58400 INSTALLATION INSTRUCTIONS

4-26-2016 REV.B



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COMPONENTS INCLUDED

| PART # | DESCRIPTION |
|--------|---|
| 58400 | 96-04 TACOMA/4RUNNER TUBULAR UCA KIT |

| COMPONENTS INCLUDED | | | |
|--|--|--|--|
| (1) 154104 96-04 TACOMA UCA (DRVR) | (1) 154105 96-04 TACOMA UCA (PASS) | | |
| HARDWARE INCLUDED | | | |
| (2) 157504 96-04 TACO BJ ADAPTER REV. C (8) 297034 HAT BUSHING 1.625 X 1.000 X .850 (4) 159200 SLEEVE 1.000 X .563 X 1.830 (2) 157505 95.5-04 TACO ADAPTER CLAMP (1) 605969 VIBRATITE RED 2ML BULLET | (2) 605337 1/2-20 X .875 12 PT FLANGED CAP SCREW (2) 605501 5/8-18 X 1.000 HHCS GR8 (2) 605052 1/4-20 NYLOCK NUT (2) 605053 1/4 SAE FLAT WASHER (8) 150025 WASHER 2.125 X .565 X .188 | | |
| TOOLS REQUIRED | | | |

JACK
JACK STANDS
TORQUE WRENCH
BALL JOINT PRESS
PICK

BALL JOINT SEPARATOR 10MM SOCKET / WRENCH 19MM SOCKET / WRENCH 21MM SOCKET / WRENCH

TECH NOTES

- 1. ICON RECOMMENDS OPTIONAL BILLET UNIBALL DUST COVER SET (191011) TO PREVENT DEBRIS FROM ENTERING THE UNIBALL CUP.
- 2. ALL ICON UPPER CONTROL ARMS HAVE BEEN ENGINEERED TO ALLOW FOR THE MOST POSSIBLE CASTER, WHILE STILL ALLOWING THE VEHICLE TO BE PROPERLY ALIGNED. NOTIFY YOUR PROFESSIONAL ALIGNMENT SHOP OF THIS INFORMATION SO THAT MAXIMUM RIDE QUALITY CAN BE ACHIEVED.



WARNING!

- ** READ ALL INSTRUCTIONS THOROUGHLY FROM START TO FINISH BEFORE BEGINNING INSTALLATION! IF THESE INSTRUCTIONS ARE NOT PROPERLY FOLLOWED SEVERE FRAME, SUSPENSION AND TIRE DAMAGE MAY RESULT TO THE VEHICLE!
- ** ICON VEHICLE DYNAMICS RECOMMENDS THAT YOU EXERCISE EXTREME CAUTION WHEN WORKING UNDER A VEHICLE THAT IS SUPPORTED WITH JACK STANDS.
- ** ICON VEHICLE DYNAMICS RECOMMENDS ALL INSTALLATION TO BE PERFORMED BY A PROFESSIONAL SHOP/SERVICE TECHNICIAN. PRODUCT FAILURE CAUSED BY IMPROPER INSTALLATION WILL NOT BE COVERED UNDER ICON'S WARRANTY POLICY.

INSTALLATION

- 1. Using a properly rated jack, raise the front of the vehicle and support the frame rails with jack stands. Ensure the jack stands are secure and set properly before lowering the jack. NEVER WORK UNDER AN UNSUPPORTED VEHICLE. Remove the front wheels.
- 2. Using a jack, slightly lift the lower control arm to prevent the arms from being at full droop.
- 3. Separate the upper control arm from the ball joint: remove the cotter pin and loosen the castle nut on the top of the upper control arm. Using a ball joint separator, separate the upper arm taper from the ball joint. At this point the spindle is free to move around, do not let the spindle assembly flop to the outside of the vehicle or the CV may pull out. Restrain spindle with bungee cords or straps. [FIGURE 1]



FIG.1

- 4. Remove the upper control arm: there is a long bolt that runs through both pivots of the upper control arm and the shock tower. Remove the nut and washer from the back of the bolt and start loosening the bolt toward the front of the vehicle. There are some components in the engine compartment that need to be temporarily moved to make room for extraction of the bolt. Some models have an air bag impact sensor bolted on the inside of the front fender well that needs to be moved. On the driver side it may be easier to remove the battery for easier access, but it is not necessary. On the passenger side there are some A/C hard lines that need to be popped out of their retaining clips to allow for removal of the upper control arm bolt.
- 5. Remove the ball joint from the spindle: remove the snap ring on the top of the spindle that retains the ball joint. The ball joint can be removed by either using a gear puller to push the ball joint down through the spindle, or by driving it out with a dead blow hammer.

6. Before installing your new upper control arms, care must be taken to grease the bushings (liberally) prior to installing assembly. Failure to grease properly will cause premature bushing wear and increased noise. [FIGURE 2]

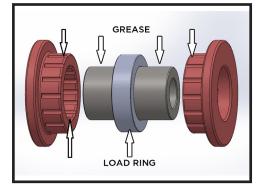


FIG.2

7. Install the (157504) ball joint adapter. The ball joint adapter and lower retainer is designed to pull itself in to the spindle. Position the ball joint adapter on top of the knuckle. There is a small step to help start the press fit. Position the retainer and 5/8" bolt (with RED thread locker) as shown, as you tighten the bolt it will pull the taper adapter into position. [Torque to 120 ft-lbs]



- 8. Install the arm on the ball joint adapter. Fit the uniball dome, make sure that the upper and lower radius meets the curve of the ball, or damage to the uniball may occur. Install the 12pt bolt with the supplied RED thread locker. [Torque to 90 ft-lbs]
- **9**. Rotate the arm up to meet the frame pivots. You may need to jack up the suspension to aid in alignment. The outer race of the uniball will rotate over the high misalignment potion of the adapter and dome.
- 10. Install the arm with the factory bolt through the pivots and frame mount. Make sure there is a large washer on both sides of the urethane bushings on both pivots (4 per side). [Torque to factory spec]
- 11. Repeat steps on opposite side.
- 12. Install wheels and lower vehicle back to the ground. [Torque to factory spec]
- 13. Have the vehicle professionally aligned.

VERIFY ALL FASTENERS ARE PROPERLY TORQUED BEFORE DRIVING VEHICLE.

RETORQUE ALL NUTS, BOLTS AND LUGS AFTER 100 MILES AND PERIODICALLY THEREAFTER.



ICON VEHICLE DYNAMICS LIMITED LIFETIME WARRANTY

ICON Vehicle Dynamics warrants to the original retail purchaser who owns the vehicle on which the product was originally installed. ICON Vehicle Dynamics does not warrant the product for finish, alterations, modifications and/or installation contrary to ICON Vehicle Dynamics instructions. ICON Vehicle Dynamics products are not designed, nor are they intended to be installed on vehicles used in race applications, for racing purposes or for similar activities. (A "race" is defined as any contest between two or more vehicles, or a contest of one or more vehicles against the clock, whether or not such contest is for a prize). This warranty does not include coverage for police or taxi vehicles, race vehicles, or vehicles used for government or commercial purposes. Also excluded from this warranty are sales outside of the United States of America and Canada.

ICON Vehicle Dynamics' obligation under this warranty is limited to the repair or replacement, at ICON Vehicle Dynamics' discretion, of the defective product. Any and all costs of removal, installation or re-installation, freight charges and incidental or consequential damages are expressly excluded from this warranty. Items that are subject to wear are not considered defective when worn and are not covered.

ICON Vehicle Dynamics components must be installed as a complete kit as shown in our current application guide. Any substitutions or exemptions of required components will immediately void the warranty. Some finish damage may happen to parts during shipping and is not covered under warranty.

This warranty is expressly in lieu of all other warranties expressed or implied. This warranty shall not apply to any product that has been improperly installed, modified or customized subject to accident, negligence, abuse or misuse.

ICON VEHICLE DYNAMICS

PERFORMANCE SUSPENSION SYSTEMS AND SHOCK ABSORBERS

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