



Fitment	Part Number
Toyota Hilux GR Sport / Rogue Widetrack	UCA59-228K

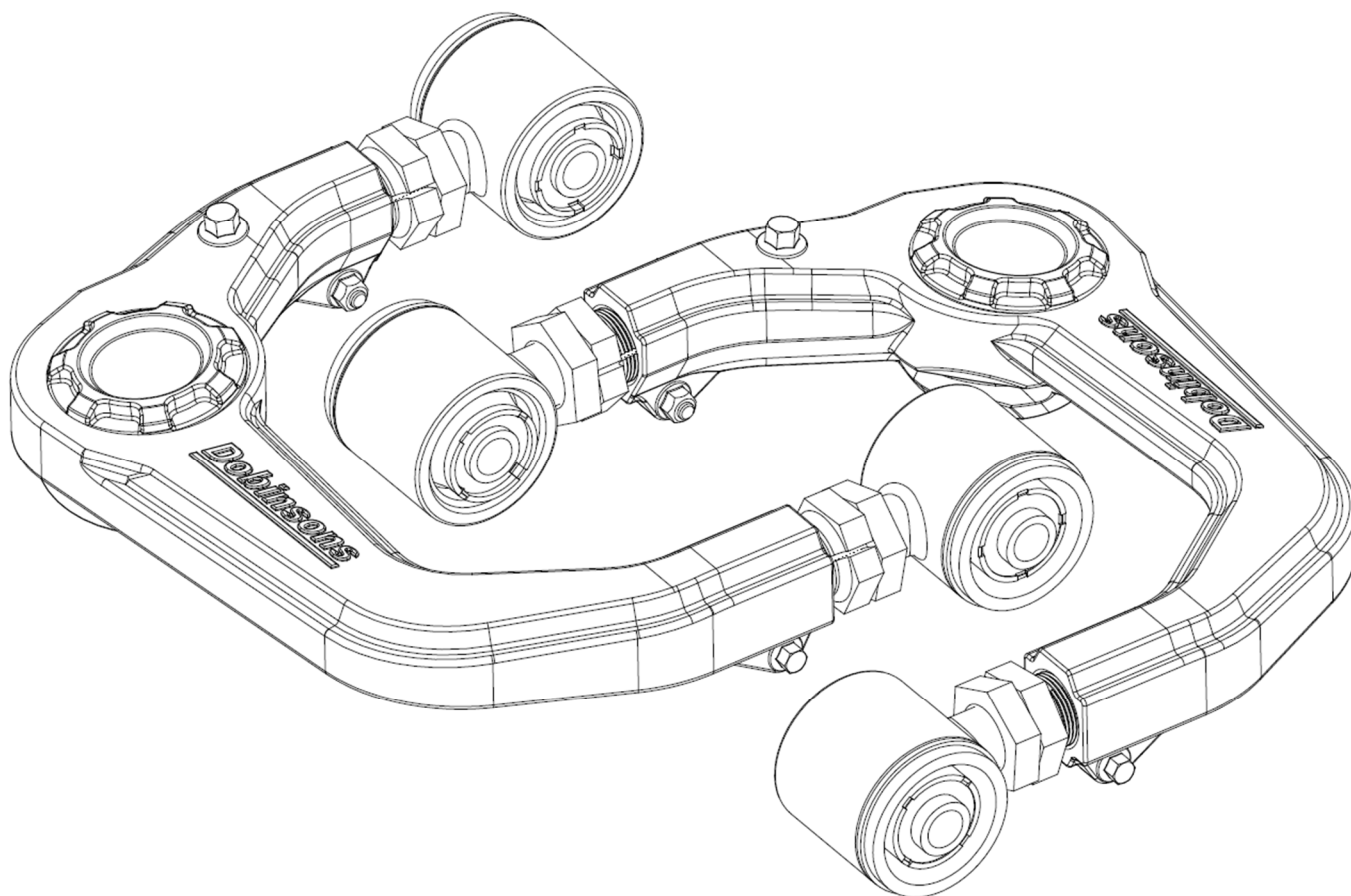
Install Instructions

NOTE – Installation is always recommended by a competent technician. Failure to properly install may result in drive and steering issues and may damage other components. These arms have 3 degrees of caster built in, and they cannot be used on a vehicle lifted less than 1.5" for a proper wheel alignment.

COMPONENTS

1X UCA59-202K-RH OR UCA59-203K-RH (UCA)
1X UCA59-202K-LH OR UCA59-203K-LH (UCA)
4X UCA59-203kwt (EYE)
4X RB59-6071 (BUSHES)
2X UCA59-BJC202 (BALL JOINT COVER)
BJ59-003 (BALL JOINT FOR UCA59-203K)

4X M22 LOCK NUT
4X M26 x 65 ADJUSTMENT SLEEVE
2X 22 x 14.2 x 8mm SPACER
4X 58 x 16 x 3 WASHER
2X M8 x 12 FLANGE HEAD BOLT
4X M6 x 30 x FLANGE HEAD BOLT
4X M6 FLANGE HEAD NYLOC NUT
2X ADJUSTMENT SPANNER



WARNING:

- Full extension of the assembled strut **MUST NOT** cause excessive load or compression of the bump stops.
- Care must be taken to ensure non-OE strut lengths do not cause interference or excessive articulation of the ball joint and CV's. A Dobinsons Diff Drop Kit may be required if binding is found.
- The ball joint assembly must operate without binding throughout the full range of travel (including bump).
- Operation outside of the working range may cause damage to the arm and could result in component failure, Warranty may also be voided.

Size	Torque (Nm)	Torque (ft-lb)
M10	49	36
M12	85	64
M14	135	96

NOTE: Before beginning, if the Sankei 555 Ball Joints supplied is not pressed in, it ***must be pressed into the Dobinsons Control Arms by a professional***. A heavy load press and proper safety equipment are required to ensure the arm is not damaged and that the ball joint is pressed into the arm correctly and all the way down so that the snap ring can go into place. *These ball joints do not have any alignment requirements when being pressed into the arms.*

BALL JOINT INSTALLATION:

1. Take off rubber boot.
2. Press in joint using a press. Press on the outer section of the joint. Try not to press on the inner section of the joint.
3. Once in place, put the circlip on the bottom side. A flat blade screw driver may help to install the circlip by levering it and moving around it as it clicks into the groove in a circular pattern. Put the circlip into place on one end in the groove, then move the screwdriver about 10mm around and lever it down, then move it around another 20 – 30mm more and lever it into the groove etc till it is all in place.
4. Install rubber boot back onto the ball joint on the bottom side. Place the spring clip on the rubber boot to stop it moving.

INSTALLATION PROCEDURE:

1. Start with the vehicle on a hoist and safely supported.
2. Remove the OE upper control arms as per the vehicle service manual, ensuring that the location of each washer and nut is kept in sequence for reassembly. **NOTE: Retain the OE fasteners that attach the UCA to the chassis as these will be reused. Any damage to the OE long bolt or nut must be sourced from the dealership.**

This will require you to grind down the bolt head slightly on the right hand side by putting a small flat on the bolt head to allow you to remove the bolt past the intake and aircon piping in the vehicle.



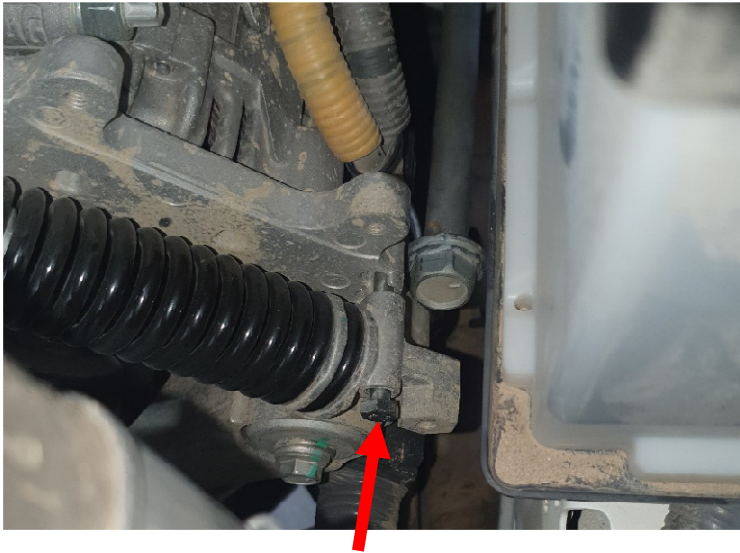
48 Volt Hybrid Diesel Models

48 Volt hybrid diesel models require an extra step to allow the control arm bolt to be removed

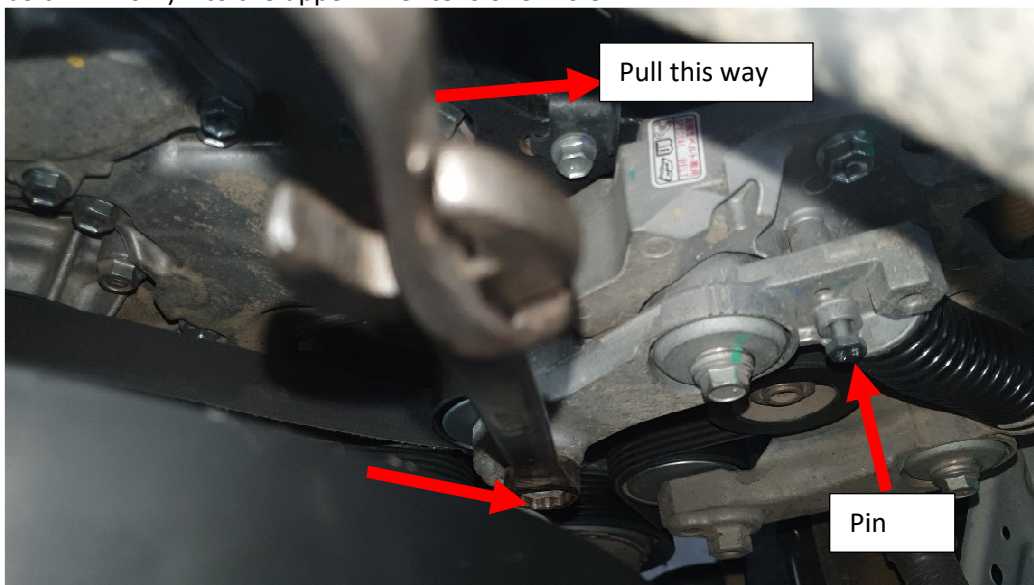
Left Side

The left side requires the front tensioner spring and plate assembly to be removed

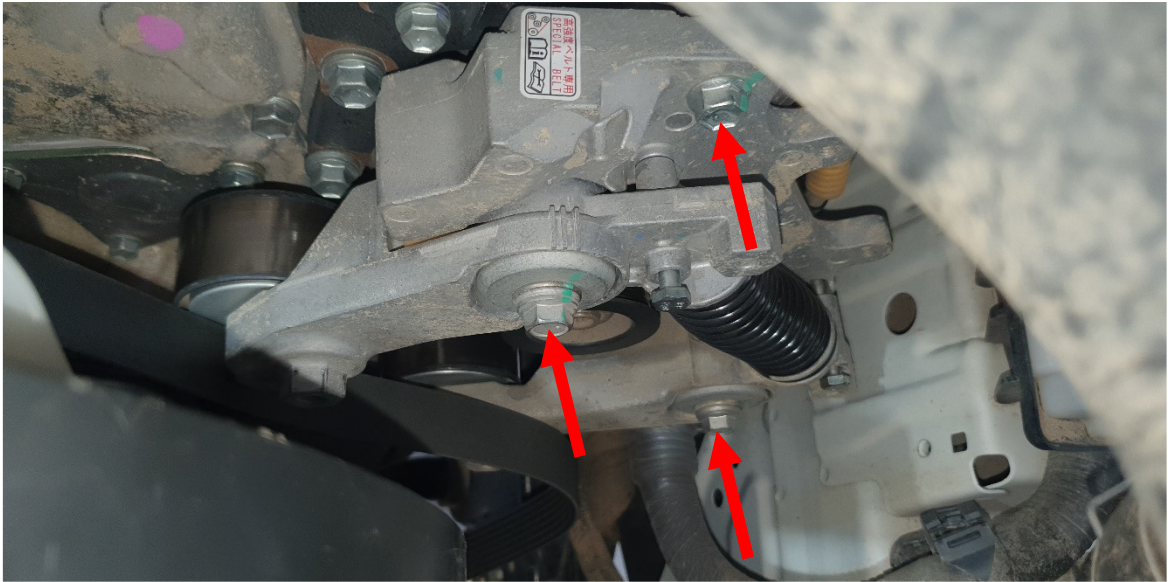
1. Pin the lower outer tensioner hole (an M6 bolt will work)



2. Place a 17mm spanner on the inner tensioner and pull it outward to allow you to install a pin (m6 bolt will work) into the upper inner tensioner hole.

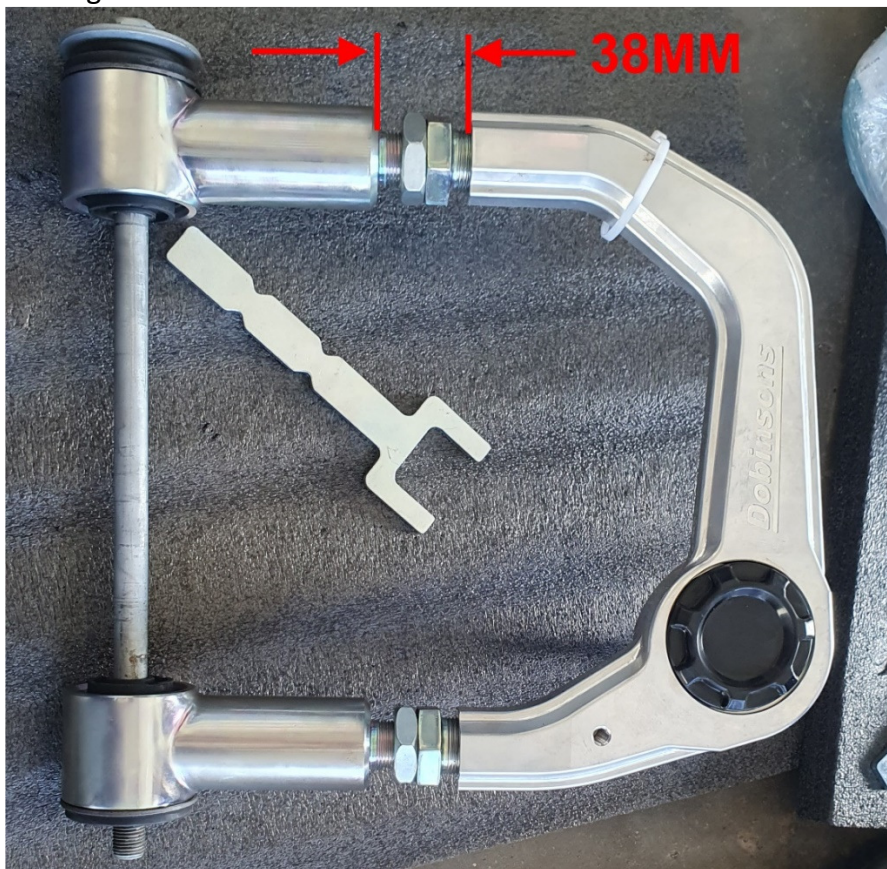


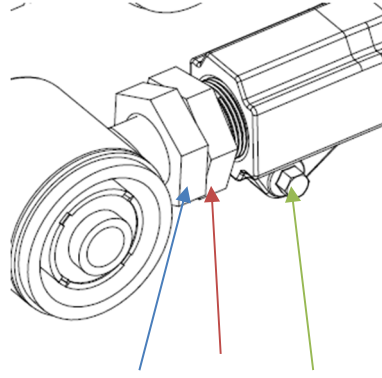
3. Very gently slide the belt off the idler pulley to all you to slip it off the alternator pulley. Take note of the belt route and try to keep the belt locator on the harmonic balancer and upper inner pulley.



4. Remove the 3 bolts as shown below.
5. VERY CAREFULLY slide the front tensioner spring and plate assembly forward and inward to allow you to remove the bolt. Install the new control arm.
6. Refit the components in the reverse order ensuring that the belt is installed and located correctly on all pulleys.

3. Set up arm as per below picture for installation. This is a good general starting point for normal alignment. Set the base of UCA to the base of eye at 38-39mm. Lock of the arm nuts against each other and tighten the locking bolt in second picture. With this setting it will give you the ability to set the alignment with the bottom lower control arm.





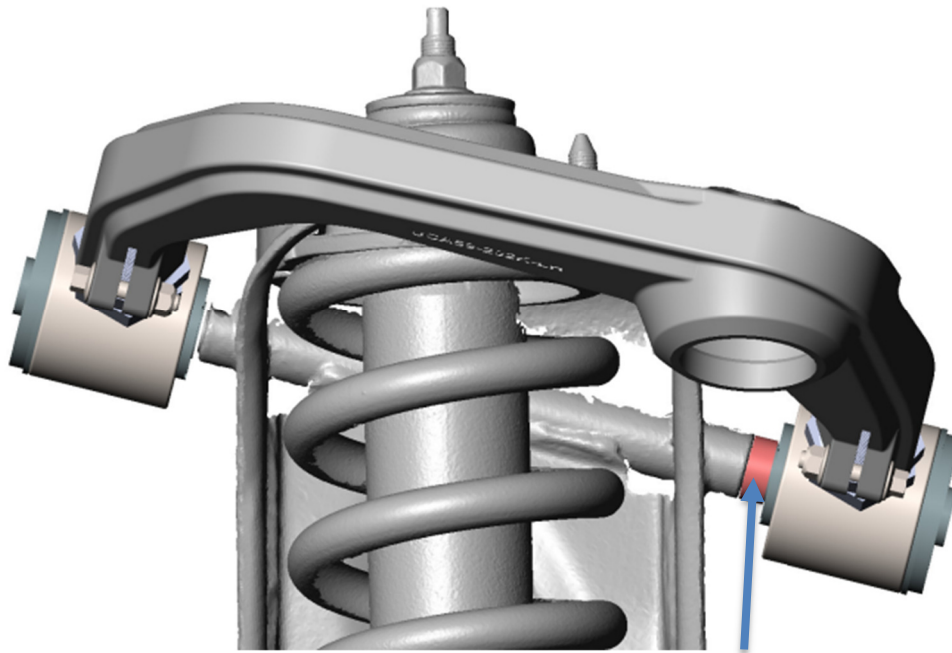
Tighten this nut (blue arrow) against other adjuster (red arrow). Tighten Locking bolt (green arrow)

4. Using OE bolts and supplied bush washers loosely bolt the Dobinsons UCA into the OE chassis mounts, using the Left and Right arms. Fit the supplied washers to the outside of the arms (outsides of either end bushes). This should look like the OE fitment.

For alignment purposes there are 2 spacers. These spaces will give approx. 2 or 3 degrees of castor. If you install the spacer on the rear side of the car, between the strut tower and the UCA bush, it will give approx. 3 degrees of castor. If you install the spacer on the front side of the car, between the strut tower and the UCA bush it will give approx. 2 degrees of castor. This will allow you to move your wheel a forward or backwards for desired alignment or clearance.

For 2" lifts and for 3" lifts that are fitting large tires it is recommended to have the spacer to the front of the vehicle to allow the castor to be wound as far forward as possible for clearance to the rear mudflap (this is recommended). For 3" lifts that desire more castor have the spacer to the rear of the vehicle.

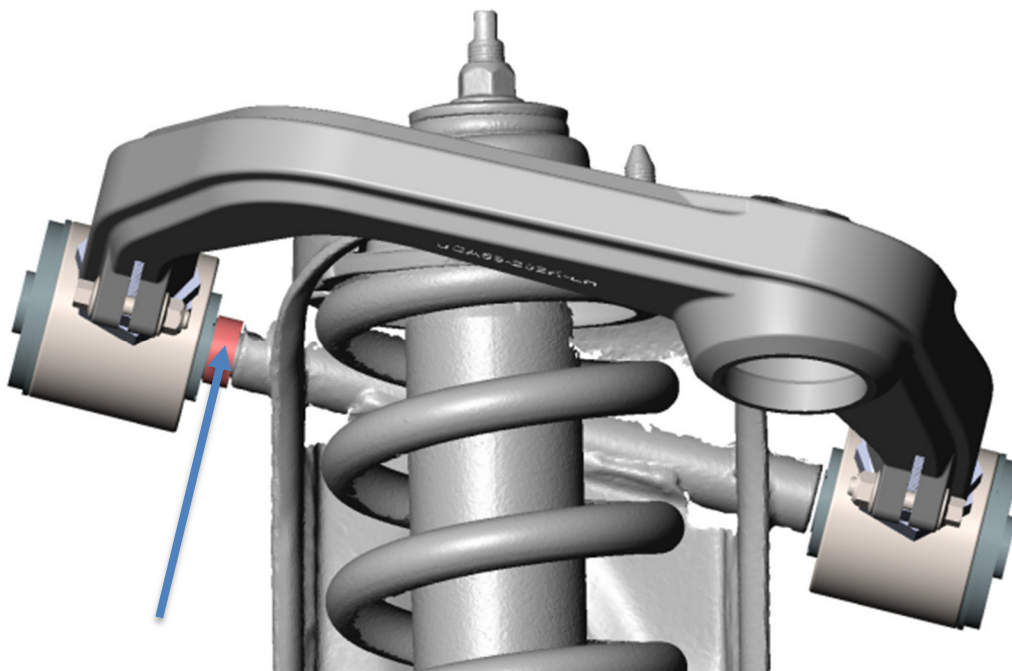
Picture 1 – Red is the spacer which is on the rear end of the vehicle. This adds more castor. It will give approx. 3 degrees from OEM.



Front of vehicle this end

Rear of vehicle this end

Picture 2 – Red is the spacer which is at the front end of the vehicle. This will give approx. 2 degrees of castor and move the wheel slightly more forward than the 3 degree settings.



Front of vehicle this end

Rear of vehicle this end

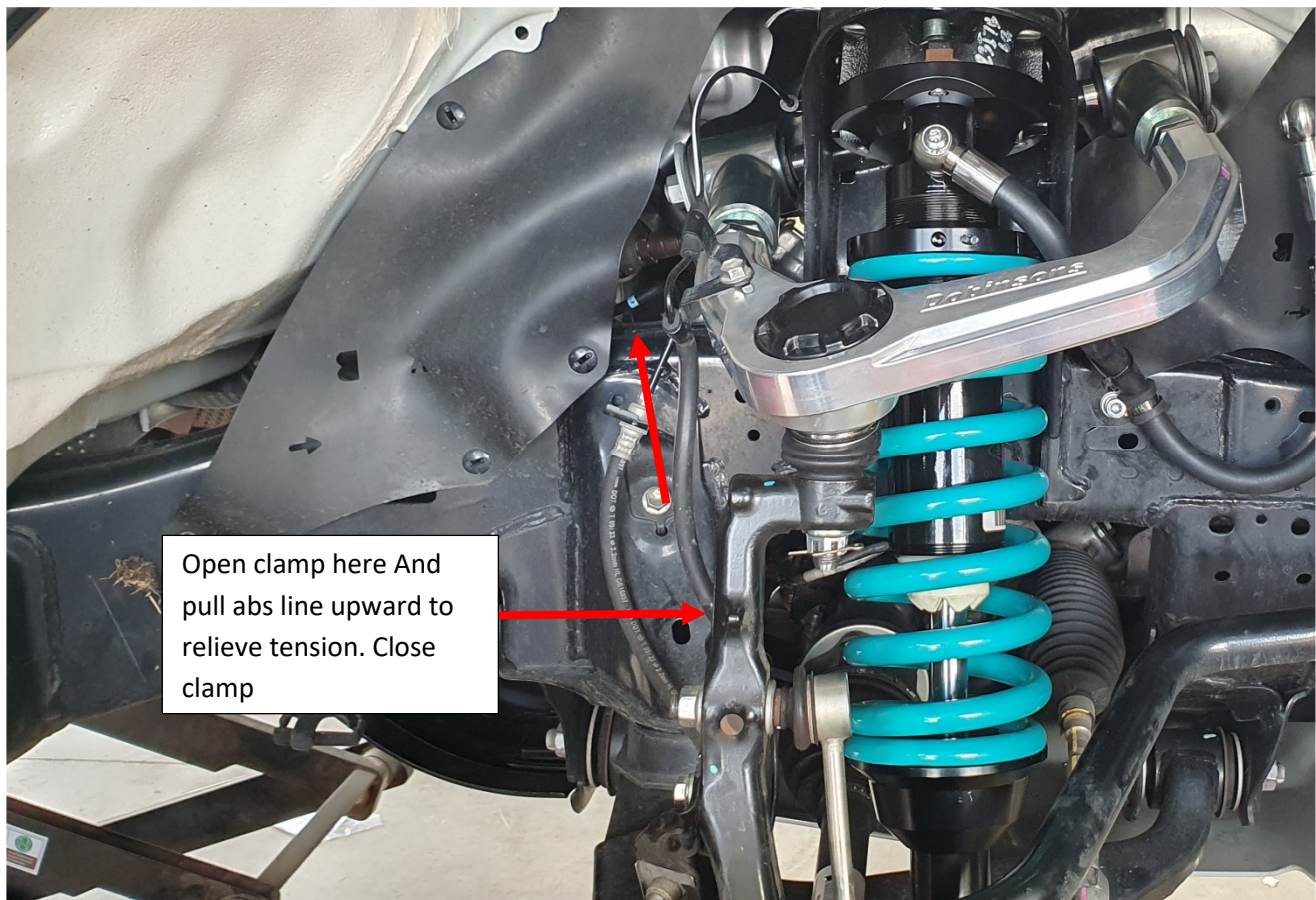
5. By moving the UCA through the normal range of movement, check the arm does not foul on any components.

6. Move all the suspension components through the full range of travel, checking that all the componentry (ball joint and upper arm) to move freely without binding. Measure the Strut length and confirm that with the suspension in the extended position (as determined by the strut being used), that all components have 'working' clearance.

7. Ensure O-ring is correctly fitted to the ball joint cover plate. Do not roll the O-ring onto it, as it could stretch the O-ring.

8. Lightly grease the O-Ring, then with the Dobinsons logo facing up, insert it into the UCA and push down firmly by hand.

9. Mount ABS line to the welded bracket on the Upper control arm using original hardware onto the external bolt. **NOTE: Open the clamp at the knuckle and pull the line upward about 10 – 20mm. Check to make sure ABS line clears all components and does not get tight though the full range of suspension movement.**



10. Tighten the long bolt up at ride height. **NOTE: do this by holding the arm up so its around 220mm from top of the ball joint cap to the guard as shown below**



11. Have the vehicle wheel alignment completed by a qualified professional.

