



Correct Installation Orientation – 2009-2005 Land Rover LR3 Front Upper Ball Joint

Brand	Supreme	Product	Ball Joint	Date	June 2021
Part Number(s)	MS10524				

To ensure proper part performance and prevent the possibility of premature failure, it is critical to press-in the below noted ball joint(s) in the correct orientation.

The identified part numbers are directional type ball joints; wherein they are designed to allow for an increased swing angle in a particular direction. Incorrect installation orientation of directional type ball joints may permit over travel of the ball stud in the improper direction, resulting in contact with the ball joint housing.

Part Number(s)

MS10524

For a successful repair outcome, adhere to the following:

- Before installation of ball joint, ensure all mating surfaces are clear of rust, debris and burrs. Inspect control arm mounting flange for cracks, deformation and or out of round condition. Do not reuse control arm body if these are found. **See Figure 1.**
- Verify press-in diameters and stud tolerances. Replace all damaged or out-of-specification mating components.
- When pressing-in ball joint, ensure pressure is applied to the mounting flange and not the ball joint back plate. Contact with the back plate during install may lead to damage and impaired performance of the ball joint.
- Locate ball joint index mark. This may take the form of a hole, dimple, tab, notch or arrow. **See Figure 2.**

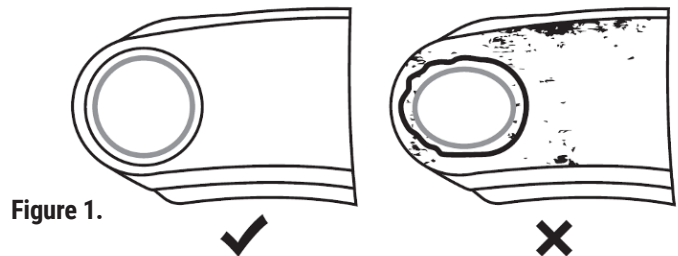


Figure 1.

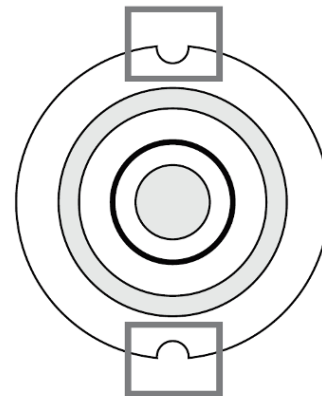


Figure 2.



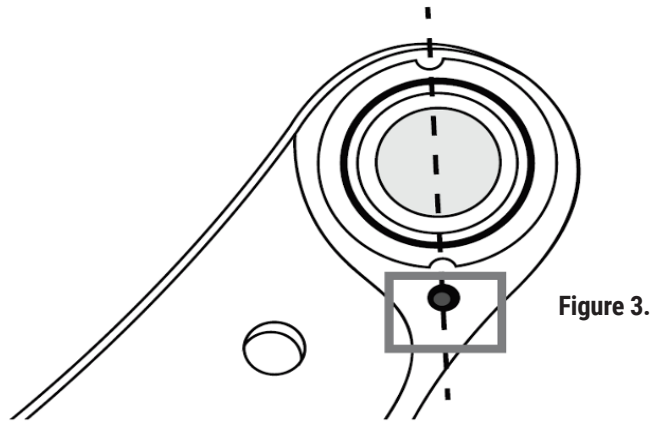


Figure 3.

- Locate control arm index mark. This may take the form of a hole, dimple, tab, notch or arrow. Ball joint index marks must align with control arm index mark during installation. **See Figure 3.**

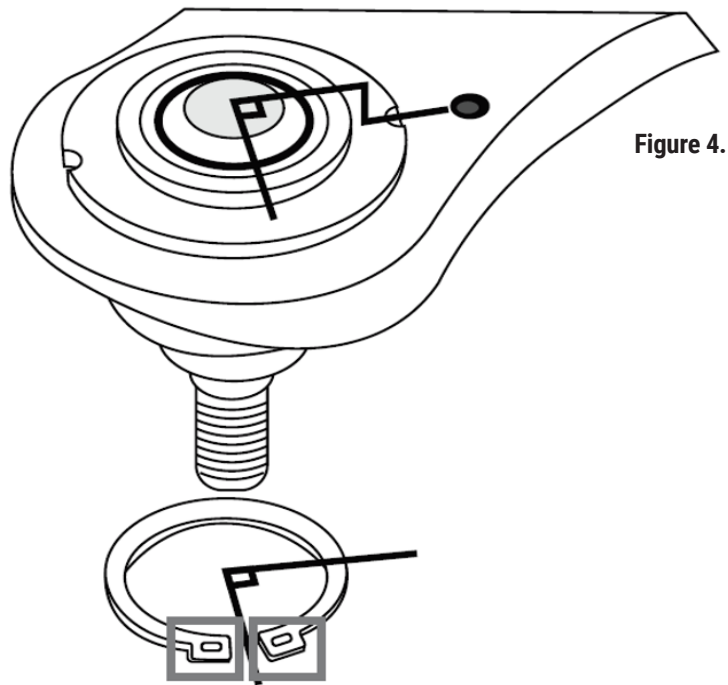


Figure 4.

- Circlip holes must be orientated 90° from index marks. **See Figure 4.**

Always ensure to refer to the factory service manual for correct diagnostic procedures, component removal and installation methods and fastening torque values and procedures where applicable. Only use a calibrated torque wrench for final fastening.