

Tech Tips

APRIL 2012 | PARK BRAKE LEVER LUBRICATION

The Skyjack boomlift models 40/45T, 61/66T, 46/51AJ, and telehandler models VR642, VR843, ZB6042, and ZB8044 use drive axles with spring applied-hydraulically released parking brakes. The parking brakes are actuated by a cylinder and dual lever mechanism on the top of the axle housing. (Figures 1 & 2)



Figure 1

Park Brake Cylinder
(Rod end)

Quick release
mechanism

Support

Park Brake Lever arm
with grease fitting



Figure 2

Park Brake Cylinder
(Barrel End)

Park Brake Lever arm
with grease fitting

The park brakes are released when hydraulic pressure is applied to the brake cylinder and the cylinder extends, pushing the brake levers apart. When hydraulic pressure is released, a spring inside the brake cylinder retracts the rod, pulling the brake levers toward each other - applying the park brake.

The park brake lever is equipped with a grease fitting and if not properly and regularly lubricated, the lever can bind up on the support pivot, breaking apart the quick release mechanism, causing the park brake to stay released.

Figure 3 shows the park brake cylinder quick release mechanism damaged because of a seized brake lever support pivot.

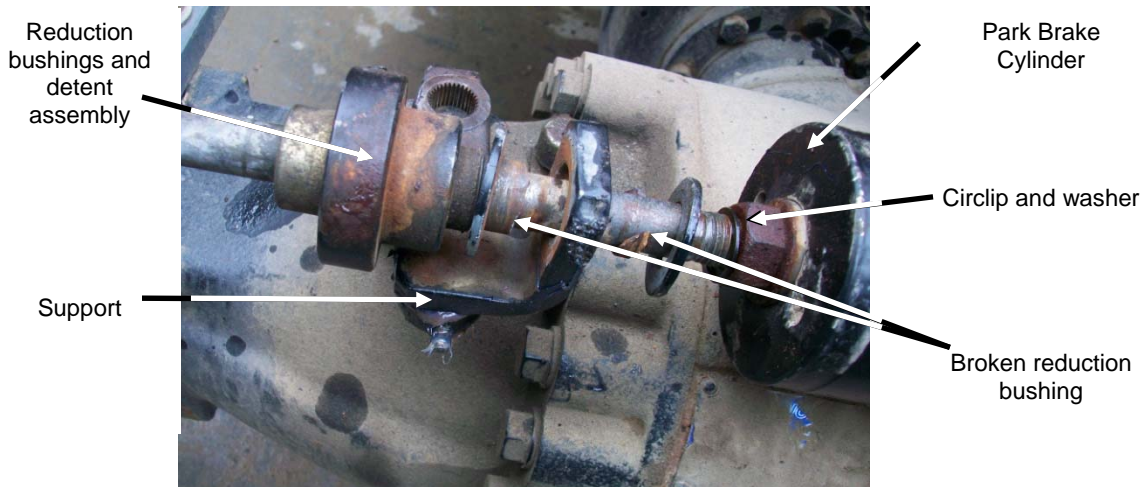


Figure 3

The pivot on the support seized and the pressure from the park brake cylinder pushed the circlip off the brake actuator rod and cracked the reduction bushing. This broke the connection to the park brake lever resulting in no parking brakes. It is very important to lubricate ***all*** of the grease points on your equipment regularly and properly to avoid costly damage and equipment downtime.

For more information regarding this axle, or any other component repair or maintenance, please consult the correct service manual for the serial number of the unit you are working on.

If you have any questions regarding your Skyjack product, please call Skyjack Product Support at 01691676236 or e-mail info@skyjackeurope.co.uk



When maintaining or troubleshooting a liquid propane (L.P.) system, check the hose to tank coupling for dirt or debris in the end. Also, check the tank fitting and the hose coupling for the tank O ring. When removing an empty tank, the O ring can get stuck in the hose coupling and prevent the coupling from threading fully onto the new tank's fitting. The coupling looks completely attached but the extra O ring will not allow the valve to extend far enough into the tank fitting. It will not leak, but no L.P. will flow into the hose.