How to Replace TOKICO Shocks

Aftermarket Division
Hitachi Automotive Systems, Ltd.
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<Important> Prohibited Actions!

Do not damage a piston rod like the below photographs, or it causes the oil leakage.

- Do not compress a piston rod with upside down (Piston rod must be upward).
- Do not grab the surface of piston rod.
- Do not use impact wrench. It will break a Shock absorber.
1. How to Replace Shocks

When replacing shock absorbers, please select the correct shocks from the application listing, and follow the instructions below.

01 When removing the used shock absorbers
① Please check and remember the positions where each of the parts are currently installed. After installing new shocks, the fittings must be set back in the original position.
② Please remove dirt and rust from screws by using a stiff brush.
③ Before removing the screws, please make sure to apply oil on to the rusted nuts & screws. If you tap delicately with a hammer, the oil will easily soak into the grooves.
④ Please do not throw away the worn shock and the removed Kits until installation of the new shocks is completed.

02 When installing the new shock absorbers
① Before installation, please check the TOYOTA number on the shock body, and compare it with the application listing, making sure the model year and fitting position, etc., are correct.
② Please confirm that all the parts required for installation are included in the product package.
③ Please do not grab the piston rod or damage it with any type of metallic tool. Damaging a piston rod will ruin the rod seal, causing leakage.
④ When installing the "eye type", please do not tighten the nut when the car body is jacked-up. Please tighten the nut in the natural position.
⑤ In case of the bolt type, please follow the diagram printed on the plastic bag for the fitting kits or the mounting-kit listing.
⑥ When installing a cartridge, please follow this procedure:
   ● Remove the strut from the car body.
   ● Remove the gland nut and take the internal parts out of the strut housing.
   ● Remove the oil in the strut housing and clean the internal surfaces.
   ● Insert the new cartridge into the strut housing.
   ● Use the new gland nut contained in the box to fix the cartridge securely in place.
⑦ Make sure that all nuts and bolts are tightened securely.

03 When scrapping the used shock absorbers
① Please take out the oil completely.
② For gas shocks, please take out the gas and oil completely.
③ Follow your local regulation when throwing away old shock absorbers.
2. Replace Suspension Strut
2. Replace Suspension Strut (1/3)

After detaching the wheels, unfasten brake hose bracket, ABS harness and stabilizer link from strut.

Support the axle carrier bottom by hydraulic jack.
Loosen the strut fixing bolts and nuts.
2. Replace Suspension Strut (2/3)

Loosen the upper mounting fixing nuts. Move the hydraulic jack slightly, detach the strut fixing bolts and nuts when lifting the strut assembly by hand. Please do not pull or damage the brake hose during the above operation.

Pull the upper mounting studs from a vehicle body and then detach a strut from a vehicle. Compress a spring by spring compressor and loosen the upper mounting top nut.
Check the upper mounting component parts structure before taking apart. Install the strut and re-assemble the spring and upper mounting component parts and then tighten the upper mounting top nut.

Install a strut to a vehicle. Make sure that all nuts and bolts have been securely tightened. Please do not over-tighten the mounting studs. Rubber insulator must not be lapped or stuck from seat portion.
3. Replace Suspension Units
3. Replace Suspension Units (1/3)

After detaching the wheels, unfasten the brake hose bracket and ABS harness from shock absorber unit. Support the lower axle bottom by hydraulic jack. Loosen the lower fixing bolts and nuts.

Loosen the upper mounting fixing bolts and nuts. Move the hydraulic jack slightly and pull the upper mounting studs from vehicle body.
3. Replace Suspension Units (2/3)

Detach a shock unit from vehicle. Please do not pull or damage the brake hose during the above operation.

Compress a spring by a spring compressor and loosen the upper mounting top nut.
3. Replace Suspension Units (3/3)

Check the upper mounting component parts structure before taking apart. Install a shock unit and re-assemble a spring and upper mounting component parts, and then tighten the upper mounting top nut.

Install a shock unit to a vehicle body. Make sure that all nuts and bolts have been securely tightened. Please do not over-tighten the mounting studs. Rubber insulator must not be lapped or stuck from the seat portion.
4. Replace Strut Cartridge
4. Replace Strut Cartridge (1/4)

After detaching the wheels, unfasten the brake hose bracket, ABS harness and the stabilizer link from strut.
Support the axle carrier bottom by hydraulic jack.

Loosen the strut lower knuckle fixing bolts and nuts.
Hold a strut surely in a housing, and then loosen a lock ring slowly by hand. **Do** operate it slowly, otherwise internal oil and nitrogen gas will splash!
4. Replace Strut Cartridge (3/4)

Pull out the internal parts of strut, and then throw away the shock absorber oil properly from the strut housing. Please do not leave the internal parts and the shock absorber oil inside the strut housing!

Insert a strut cartridge surely into strut housing.
4. Replace Strut Cartridge (4/4)

Make sure that lock ring has been securely tightened by hand. Please do not over-tighten! Please do not hit a piston rod of the cartridge by hand or tooling during the process of assembling.

Install a strut to a vehicle body. Make sure that all nuts and bolts have been securely tightened. Please do not over-tighten the mounting studs. Rubber insulator must not be lapped or stuck from seat portion.
END

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