

Mitsubishi 2008-2016 EvoX SST 6 Speed Automatic Transmission Repairs

SST gearboxes have very fine oil channels that are pumped by 9 small electronic solenoids, the gearbox is sensitive to these oil pressures to change the gears via the shift forks, and the Mechatronic unit is there to measure millimeter by mm, every gear fork movement to ensure correct operation. Oil thickness, oil quality, and oil level all affect how well the oil galleries direct oil to the gear fork movements. Trouble codes ensue quite easily when one of the forks get out of alignment, the mechatronic tubes measure the sensor magnets on the forks. After a track day with your EvoX, the sensors easily get out of alignment from a difference in oil viscosity, a difference in clutch wear, or some of the metal shavings moving away from the magnets that the sensors use to detect the position of the forks. Therefore you must re-learn the gearbox every 6 months or after a track day, or just before winter kicks in. You should also do an oil change before each SST Teach In procedure. You can do a Teach-In with EvoScan. and Reprogramming of the SST ecu with EvoScan for the different SST software upgrades and teach-in software available. Some EvoX's such as the 2008, you flash in a newer software to do the teach-in calibration, and then flash back to the original software for day-day smooth SST running software. Flashing in new software to your SST computer does not overwrite the learned values that are set during SST Teach-In procedures.

LATEST 2019 RECOMMENDATION FOR SST SERVICING - Hamish, EvoScan.com

1. Change the SST oil every 3 years or 60,000km (37,000miles). the Mechatronic has very small solienoied oil channels, the oil needs to be kept clean, 5 to 7 micron size metal particles can still get through the oil filters. Its easy, just underneath the SST undo the 3 drain bolts, and the filler hole is on the top (under the Air filter) next to the SST gear selector arm. The drain plugs and filter plug use a standard hex allen key. There is actually an oil level check plug just in behind the passenger side half axle cv joint, where the SST oil should just be up to that point when the car is on flat ground, if no oil comes out then top it up, if oil comes out then the SST is probably overfilled.

2. Replace the SST oil filter every 3 years or 60,000km. If you can get it for \$20 to 30USD. Its easy to access just behind the wheel.

3. SSTF1 is the official DiaQueen Dual Clutch Transmission Getraq DCT 6-SST gearbox oil. Yes its \$200 each time, but an SST overhaul is \$3800 (thats 19 years of oil replacements... just do it, change your SST oil tomorrow, don't delay.) Penrite has a DCT replacement oil for 1/3rd the cost. It should be noted that at least 1 good transmission shop has tried about 4 different DCT oils looking for a cheaper SSTF1 replacement, but has always reverted back to SSTF1 mitsubishi oil because SSTF1 has the smoothest and best gear shifts possible.

4. If you are in New Zealand, send your gearbox to Dodson Motorsports in Auckland, they are the best and cheapest in NZ for fixing SST EvoX transmission issues. Turned out once the gearbox was apart, it was my clutch basket that was burnt out and seized to the thrust bearing and the SST wouldn't change into any gears. and was giving a DTC SST code of P1836 Malfunction of shift fork 1 and P183D Malfunction of shift fork 2

Ford Powershift 6DCT450 Getrag is the EvoX SST Workshop Service Manual

How To change the SST oil
<https://www.youtube.com/watch?v=M4WtZUhf7kM>
source: <https://axleaddict.com/cars/Powershift-Automatic-Transmission-Faults>

LATEST 2019 MITSUBISHI EvoX SST Technical Service Guides

[TSB-16-22-001 CLUTCH REPLACEMENT GUIDE.PDF](#)

[TSB-16-22-002 GEAR NOISE AFTERCOLD ENGINE START \(2009 - 2010 MODELS\) - REVISED.PDF](#)

[TSB-16-22-003 TC-SST TRANSMISSION & MECHATRONIC ASSEMBLY DIAGNOSIS & REPAIR - REVISED.PDF](#)

Tech Talk Bulletins Relating to EvoX SST

08/18/2009 TT-162-22-002 TC-SST REPAIR PROCEDURES ADDED

10/14/2008 TT-153-22-001 TC-SST OIL LEAKAGE FROM NEW SERVICE PART

08/12/2008 TT-151-22-001 VIN and VARIANT CODING REQUIRED WHEN REPLACING TC-SST

EvoX/Ralliart SST Youtube videos:

[MRT Performance Australia - 5 Youtube videos on SST](#)

[Mitsubishi Evo X Ralliart SST Gearbox](#)

[Mitsubishi Lancer Ralliart Evo MR SST problem found](#)

[Mitsubishi Evolution X TS-SST](#)

[Evo SST fluid change](#)

[Mitsubishi Lancer Evolution X MR TC-SST Blown Twin Clutch Transmission Repair Replacement](#)

[Evo X Transmission Removal Guide](#)

[Evo 10 and Ralliart SST Shift Fork 2nd and 4th Gear Problem](#)

[6DCT470 Transmission Hard Parts Identification Video](#)

[SST mechatronic remove 6 DCT470 Evolution X Ralliart](#)

[Mitsubishi Evolution X TS-SST](#)

[SST Mitsubishi Evolution X DCT470 vs DCT450](#)

[Assembly of the clutch DCT Stage 4 for the Evo X TC-SST](#)

[ATSG: Learning The Getrag's DCT450 470 Transmissions](#)

EvoX SST Parts shops:

https://dekaclutch.com/index.php?route=product/product&path=74_82&product_id=122

<https://www.jackstransmissions.com/products/tc-sst-torque-damper-assembly>

<https://www.revzone.com.au/service-center/evo-x-ralliart-sst-service-repair/>

<https://www.dodsonmotorsport.com/evo-x/tools/sst-clutch-tool-kit.html>

https://www.mrtperformance.com.au/cat/product/driveline/clutch-kits/category-1357?product_list_limit=30

<https://www.kozmicmotorsports.com/mitsubishi-evo-x/evox-6spd-sst-transmission.html>

Mitsubishi Dealer Parts Japan - OEM Mitsubishi Seal Kit \$139NZD