43: Transmission, automatic, B5254T2, AW50/51 AWD V70 XC (01-) / XC70 (-07), 2004, B5254T2, AW50/51 AWD, L.H.D, YV1SZ59H241147306, 147306 15/10/2011



PRINT

# 43: Transmission, automatic, B5254T2, AW50/51 AWD

Transmission, removing

## Special tools:

998 5972

999 5460

999 5463

999 5681

999 5716

999 5972 999 5562

999 7076

999 7077

Note! The illustrations in this service information are used for different model years and/or models. Some variation may occur. However, the essential information in the illustrations is always correct.

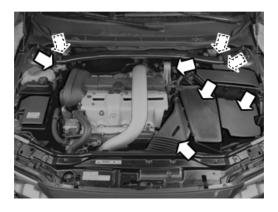
Preparatory work
Filling in Diagnostic
and Check lists

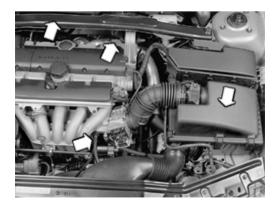
Note! Before replacing the transmission, fill in: Diagnostics/check list, B5254T2, AW50/51 AWD and enclose in the returns box.

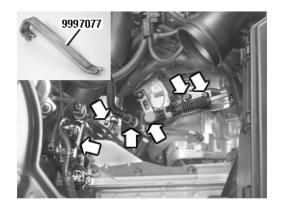
Removal

Disconnecting the battery lead

Disconnect the battery negative cable in accordance with: Battery, disconnecting.







# Removing engine compartment components

Only applies to turbo engines, remove:

- the torque rod. See Brake fluid reservoir, replacing
- the cover at the side of the air cleaner (ACL) housing (applies only to B5254T4)
- the fresh air intake hose
- the air cleaner (ACL) housing assembly. Unhook the control valve from the air cleaner (ACL) housing.

Applies only to naturally aspirated engines, remove:

- the upper torque rod in accordance with: Brake fluid reservoir, replacing
- the air cleaner (ACL) housing with the intake manifold and preheating hose
- the vacuum hoses, 2, from the intake manifold to the control valves
- the ground lead between the mounting on the engine and the bulkhead (where applicable).

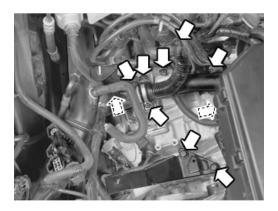
Removing components from the gearbox

### Remove:

- the gear selector cable, use: 999 7077 to detach the ball joint for the cable from the lever
- the gear selector cable mounting from the gearbox
- the oil pipe from the gearbox.Plug the gearbox and pipe.

Unhook the mounting with the connector for the gearbox from the bracket for the air cleaner (ACL) housing. Disconnect all the connectors.

Removing the





# gearbox mounting screws

Remove the bracket with the connectors for the heated oxygen sensors (HO2S) and the clamp for the cable harness from the gearbox.

### Remove:

- the screws for the clamp securing the cable harness at the rear edge of the engine
- the nut, 1, for the bracket to the cable harness and the coolant hose
- the bracket for the air cleaner (ACL) (only applies to B5254T4)
- the 3 screws for the gearbox and engine and the 2 screws for the starter motor.

Tie up the cable harness.

Removing the coolant hose from the passenger compartment heater

Clamp the hoses with hose clips.

Place some paper under the inner hose connection to collect any spilled coolant.

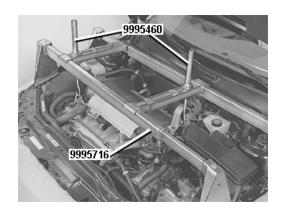
Turn the quick-release connector (the inner of the 2 hoses) slightly in the direction of the arrow so that the lock opens.

At the same time, pull the coolant hose straight out of the coolant pipe.

Installing the lifting beam and lifting hook on the engine lifting eyelet

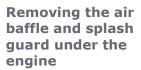
Position: 999 5716 on the wheel arch and directly above the engine lifting eyes on the left and righthand sides.

Connect 999 5460 on the righthand side of the engine with a clearance of 10 mm. Tighten to



light contact on the left-hand side.

Set the wheels straight. Remove the ignition key and activate the steering wheel lock. Raise the vehicle.





### Remove:

- both the front wheels
- the screws for the splash guard under the engine
- the screws for the air baffle.

Press in the catches holding the air baffle and remove it.



# Removing the screw for the cable duct

Unhook the cable duct from the sub-frame.

Remove the screw securing the mounting for the ground lead in the sub-frame

# Note! Applies only to cars with parking heaters.

Remove the 3 screws from the heater.

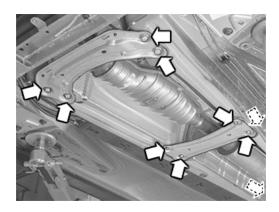
Hang or tie up the heater on the left front wing.

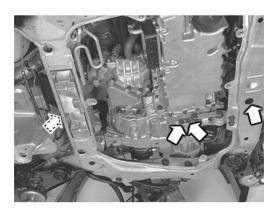
Detach the fuel line for the heater from the holders on the sub-frame.

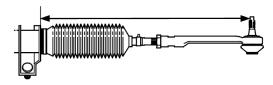
Removing the cross members from the body

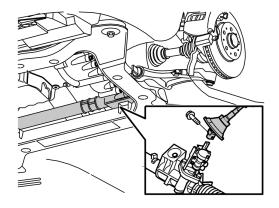
### Remove:

• the screws for the









- crossmember, furthest forward, x 4
- the brake pipe from the front cross member
- the screws on one side, 2, and undo the others, 2, so that the crossmember is hanging loosely.

Removing the screws and nuts for the engine pads, torque rod

### Remove:

- the screw, 1, for the front/rear engine pad
- the screws for the torque rod.

Measuring the position of the tie rod in the steering gear

On one side, measure the length of the track rod in relation to the steering gear housing. Note the measurement.

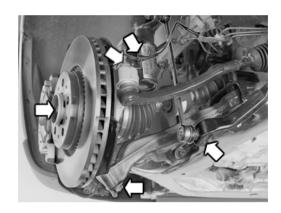
Exposing the steering shaft joint

Remove the screw, 1, to the joint between the steering gear and the steering wheel shaft.

Press the joint up from the steering shaft.

Detach the cable to the stepper motor/solenoid.

Removing front suspension components (both





Detach the ABS cable from the bracket in the spring strut on the left-hand side.

#### Remove:

- the screw, 1, for the drive shaft, counterholding with a screwdriver in the brake disc vents
- the nut for the ball joint / link arm. Clean the exposed threads outside the nut. Spray using rust solvent before removing the nut.

For steel control arm, see: Ball joint, replacing

### Remove on the left-hand side:

- the link from the anti-roll bar
- the tie rod.

Note! Counterhold using a Torx TX 40 at the ball joint pinion when removing the nut. This is so that the ball joint boot does not turn.

Preparations when removing gearbox

Remove the 2 nuts from the wing liner. Remove the support plates on both sides.

## Note! Only left-hand side.

Angle out and tie up the wing liner to the lifting beam using a retaining strap.

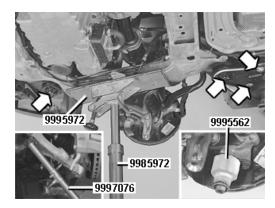
# Caution! Do not forget to protect the front fender.

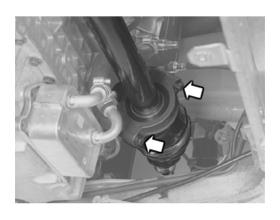
Preparations for lowering the subframe

Unhook the link arms from the ball joints on both sides. Use: 999 7076 . Install: 999 5562 . Hold the sleeve in place with the ball joint nut.

Bend out the spring struts and









detach the drive shafts from the wheel hubs so that the gaiters are not damaged. Hold the spring struts away using a retaining strap to obtain better space when the drive shafts are removed.

Keep the seal on the outer constant velocity joint housing if it falls off.

Remove the screws from the subframe support plates (both sides).

Apply: 998 5972 together with: 999 5972 lightly under the right-hand side of the sub-frame.

Slacken off the screws for the subframe on the right hand side. Ensure that the nuts are still secured by at least 5 threads.

Remove 998 5972.

Removing the righthand drive shaft

Remove the screws to the drive shaft bearing cap and remove the support bearing cap.

Remove the drive shaft by pulling it straight out from the gearbox.

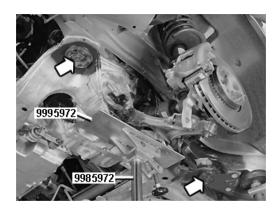
Note! On vehicles equipped with AWD the drive shaft runs through the angle gear.

Removing the lefthand drive shaft

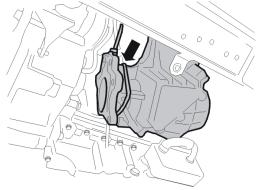
Remove the drive shaft from the transmission. Use: 999 5681 .

Lowering the subframe

Position the mobile jack (lightly









applied) under the left-hand side of the sub-frame. Remove the subframe screws. Lower the sub-frame.

Note! Check that the hoses and electrical cables are free and not stretched when lowering. Remove the mobile jack and let the frame hang freely.

# Removing bevel gear

# Note! Only applies to vehicles equipped with AWD.

Remove the angle gear screws, 5. Pull the angle gear straight out from the gearbox.

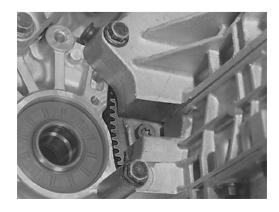
Hang the angle gear up in an oil pipe to the turbocharger or similar for example.

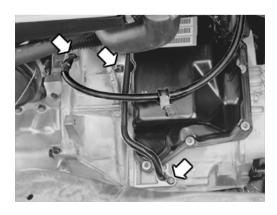
# Removing the rear engine mounting

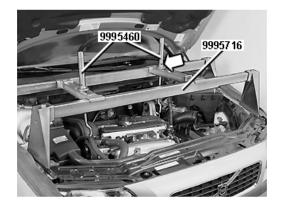
# Remove:

- the 3 screws
- the mounting and the engine pad.

Removing the screws from the torque converter







Remove the 6 screws for the torque converter.

Turn the engine using a socket and ratchet. Pull out the right-hand wing liner slightly so that the crankshaft nut can be accessed more easily. Use a Torx TX50 socket on the torque converter screws.

# Removing the oil pipe from the gearbox

Position a container under the pipe terminal.

#### Remove:

- the 2 screws holding the pipe.
   Remove the pipe from the gearbox. Install sealing plugs in the pipe and the gearbox.
   Carefully fold the hose out of the way
- the ground lead from the gearbox.

Lowering the engine and the gearbox

Lower the vehicle.

Lower the engine/gearbox on the left-hand side with the lifting hook.

Note! Check that no hoses or cables are being stretched or trapped when the engine is lowered.

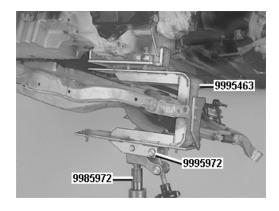
Lower the engine until the lifting hook stop can be seen in the hole on the hook's upper part, see illustration.

Raise the vehicle.

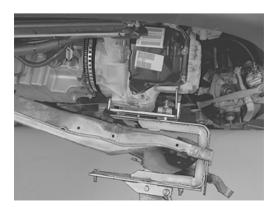
Installing the fixture on the mobile jack and gearbox

Install: 999 5463 to: 999 5972.

Use the fixture and the plate together with: 998 5972 .







Align: 999 5463 to the fixture and the transmission.

Note! The support plate is installed on the inside of the fixture mounting lug (see image).

Tighten the fixture with the torque rod screws, 2.

Apply the mobile jack lightly against the gearbox.

Removing all the screws for the gearbox and engine

Remove the remaining 7 screws for the gearbox and engine.

Removing the gearbox

Note! Ensure that the transmission is taken straight out in relation to the engine.

Note! Make sure that the torque converter follows with the gearbox and that it does not slide off the stator shaft.

Press with a screwdriver through one of the screw holes in the carrier plate.

Caution! Do not pry toward the flange rim for the flywheel sensor.

Note! Lower the gearbox slightly when it is being removed so that it will pass the side member freely.

Remove the gearbox.

15/10/2011 PRINT