

Steering - Knocking/Thumping/Clicking Noises

NO: 64-21

DATE: 5-3-2006

YEAR/MODEL/CHASSIS: XC90, MY03-, 000690-

S60 (incl. R-line), MY04-, 315000-

V70 (incl. R-line), MY04-, 349000-

XC70, MY04-, 123000-

S80, MY04-, 335000-

SUBJECT:

Steering noise, yoke adjustment

DESCRIPTION:

Under certain conditions a knocking, thumping, or clicking noise may be heard from the steering. The noise may be heard as a metallic or hydraulic noise. The noise can be heard under the following conditions:

^ Driving on uneven roads or other large imperfections in the road, especially during right-hand turns.

^ When stationary, turning the wheel quickly from side to side. The noise may be heard with the engine on or off, and may also be felt in the [steering wheel](#).

^ Driving at slow speeds and turning the [steering wheel](#) back and forth/left and right. The noise can become louder when there is increased torque with the steering wheel movements.

SERVICE:

If there is a verified customer complaint of the above-described noise, first check the front end for wear, and rule out any other possible sources of this noise. If it is determined that the noise is coming from the [steering gear](#), an adjustment of the steering yoke can be made. Follow the procedure below.

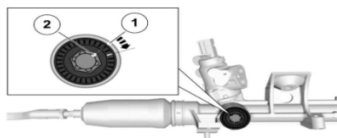
Note! This adjustment must only be carried out once. As stated at the end of this procedure, after this adjustment is made the adjuster screw should be color-marked in white. If there is a white color mark, this means that the adjustment has already been made, so do not adjust the yoke again.

Adjustment

Raise the vehicle so that the [wheels](#) hang freely.

Note! The adjuster screw must only be turned a maximum of 4 index marks from its original position in a clockwise direction as described below.

Remove the protective cover from under the engine.



Disconnect the connectors for the heated oxygen sensors (HO2S) from the subframe, and on the V8, bend any protective plates aside, so that the adjuster screw is visible. Make two ink marks, one on the edge outside the adjuster screw, and an adjacent mark on the screw itself, to establish original position (1 and 2 in the illustration). Bend the anti-roll bar out of the way slightly using a pry bar. This is so the 17mm socket can fit onto the hex head of the screw. Then tighten the adjuster screw 2 index marks in a clockwise direction. Check that no unusual stiffness or blockages occur in the [steering gear](#) when the [wheels](#) are turned from side to side to their limit positions. If this occurs turn the adjuster screw back 1-2 marks.

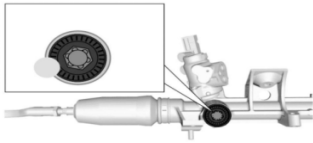
Note! The checks must be made with the vehicle raised so that the [wheels](#) hang freely. Test drive the car.

If any noises/play/clearance still remain after carrying out the above adjustment, the adjuster screw can be turned clockwise a maximum 2 index marks further. Check that no unusual stiffness or blockages occur in the [steering gear](#) when the [wheels](#) are turned from side to side to their limit positions. If this occurs turn the adjuster screw back 1-2 marks.

Note! The checks must be made with the vehicle raised so that the [wheels](#) hang freely.

Note! All [steering wheel](#) movements must be performed slowly and gently.

Test drive the car.



After carrying out the adjustment and checks: Clean any grease from the surfaces of the adjuster screw and steering gear housing. Then color-mark the adjuster screw using a permanent visible white color. Reposition the protective plates, reconnect the HO2S connectors, and reinstall the protective cover under the engine.

LABOR OP	LABOR DESCRIPTION	LABOR TIME
64211-2	Check marking, steering yoke	0.1 hr
64212-2	Adjust steering yoke adjuster screw	0.3 hr
64213-3	Adjust steering yoke adjust screw after test drive	0.1 hr

Claims may be submitted under the New Car Warranty when there is a documented customer complaint, using claim type: 01.