

15MPH Noise on propeller shaft/rear axle

Topic number	LI41.10-N-068968
Version	5
Function group	41.10 - Propeller shaft
Date	10/4/21
Validity	Model 907
Reason for change	Title and remedy changed

Complaint

Noise on propeller shaft or rear axle from approx. 15 mph (vibrations, humming, droning, howling, running noise of axle drive).

Cause

Under analysis

Remedy

In event of corresponding customer complaint, please create a TIPS case and include the following data:

- Is it a humming or a howling noise?
- Do vibrations occur at the same time?
- Does it occur at a specific engine speed, regardless of which gear is engaged?
- Is it louder in one gear than in another?
- When exactly does the problem occur?
- At what road speed?
- In which gear?
- At what engine speed?
- In which load condition?
- When carrying what sort of load?
- In what vehicle operating conditions (warm or cold)?
- Which tires and what size of tires are installed at present (attach pictures to the case)
- What type of leaf spring is installed: 1-leaf / 2-leaf / 3-leaf (attach picture of leaf spring, ensuring part number is legible).
- Pictures of the vehicle (inside, outside and underfloor, incl. suspension)

XENTRY TIPS

If possible, attach picture of propeller shaft with adhesive label including legible part number. (See Picture 01)

- Always make a film recording with video and audio when humming, droning, howling or whistling noise is involved.

Proceed as follows:

1. Driving at constant speed with noise
2. Accelerate through the noise and call out "Now" when in the loudest gear
3. Accelerate through the noise and call out "Now" when in the next nearest gear
4. Information about load: No / yes (how many lb/kg)


When doing so, make sure that there is no background noise.

- Where vibrations are involved that can be picked up the hands, feet or posterior, proceed as follows:
 1. Measure the vibrations using XENTRY Scope with rpm sensing and an accurate speed indication and record it
 2. Information about load: No / yes (how many lb/kg)

As an alternative to the XENTRY Scope recording, you can also use the XENTRY NVH Diagnosis app.

Information about the Xentry Scope vibration measurement or the XENTRY NVH Diagnosis app is available in <https://xentry.daimler.com>.

For vehicles with a rear axle "howling" problem between 70 and 90 Km/h or 45 – 55 mph, refer to LI35.00-N-073703

Attachments	
File	Description
01.jpg 	Propeller shaft

Symptoms

XENTRY TIPS

Power transmission > Noises > Throbbing/intermittent humming
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Power transmission > Noises > Humming/droning

Power transmission > Drive shaft > Propeller shaft > Noises > Humming/droning

Chassis/suspension > Noises > Humming/droning/throbbing

Operation numbers/damage codes				
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Op. no.	Operation text	Time	Damage code	Note
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