

Reduce complaints with correctly mounted HUBs

Many vehicle manufacturers incorporate a “HBU1” design wheel bearing and when it needs replacing, technicians can sometimes make a crucial error during the mounting process.

When installing the new bearing into the hub, the pressure is often misdirected and damage can either occur to the seal, or the rolling elements inside – the most common complaint from the driver or the garage as a result of this error is “noise”. Using the correct mounting tools is important when installing this type of HUB bearing, and will significantly reduce these types of complaints and warranty claims in your garage. This type of problem often

occurs when the incorrect tools are used for mounting the bearing into its carrier. Contact is made with the seal or the inner ring, rather than the outer ring, resulting in the bearing not being pressed vertically into the knuckle. This leads to water ingress into the bearing, misalignment of the rolling elements and flaking, which eventually leads to noise.



Sample pictures of water ingress in a HBU1 type bearing (Generic images – not VKBA 3496)

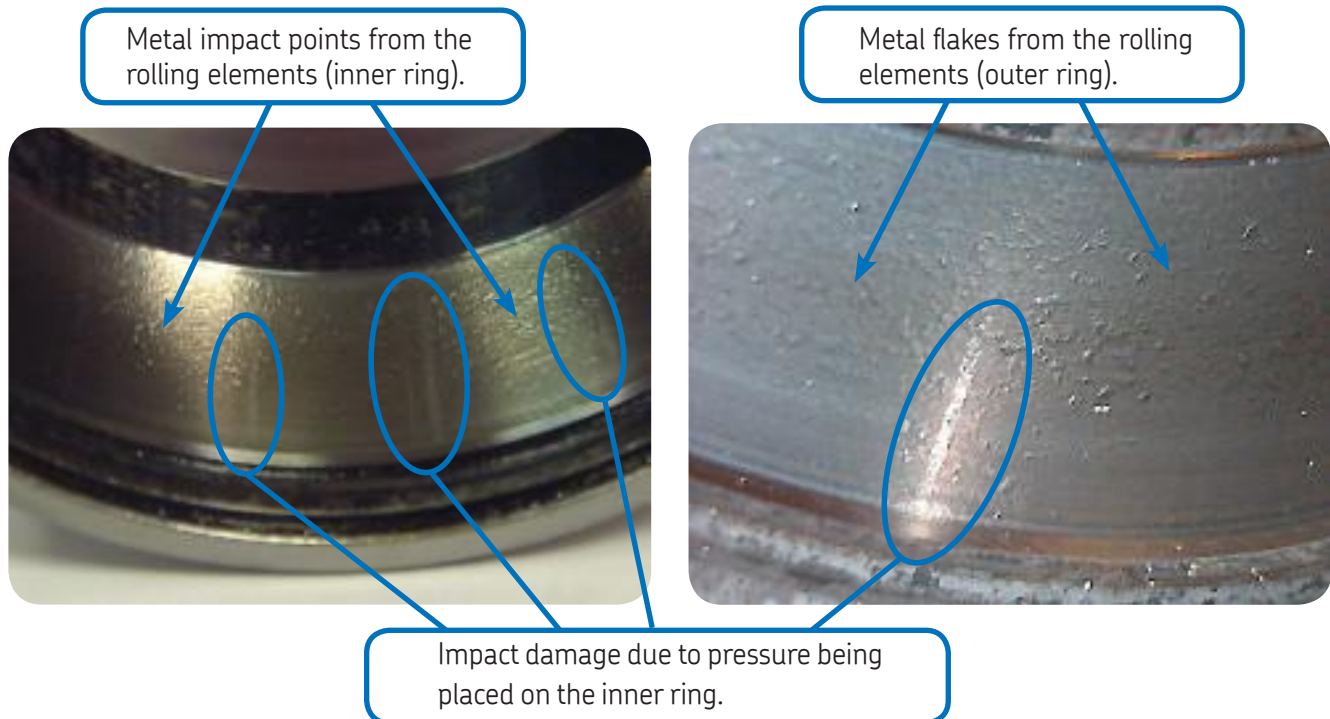
Vehicle applications – VKBA 3496

MODEL	MODEL
RENAULT 11	RENAULT CLIO II
RENAULT 19 I and Chamade	RENAULT RAPID BOX
REANULT 19 II and Chamade	RENAULT SUPER 5
RENAULT 9	RENAULT THALIA
RENAULT CLIO I	RENAULT TWINGO



SKF Pole Position

Examples of this type of fitment error are often seen when the bearing is returned under warranty – the following images highlight that pressure has been placed on the inner ring or seal during the installation of the bearing into the knuckle.



Fitting guidelines for mounting the VKBA 3496

1. Remove the old bearing from the steering knuckle.
2. Carefully clean the surface in the steering knuckle and make sure there is no damage.
3. Apply a thin 3–5 mm coating of "Antifret Paste" (SKF LGAF3) to the circumference of the bearing outer ring. This paste must only be applied to the "ABS" magnetic sensor pick-up end of the bearing (do not apply to the magnetic sensor itself).

Caution: bearings fitted with an magnetic ABS ring must be mounted the correct way around – the magnetic ring must face the ABS sensor.

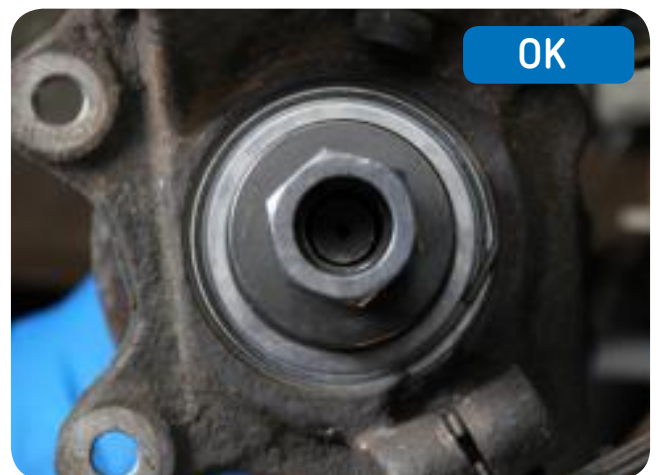
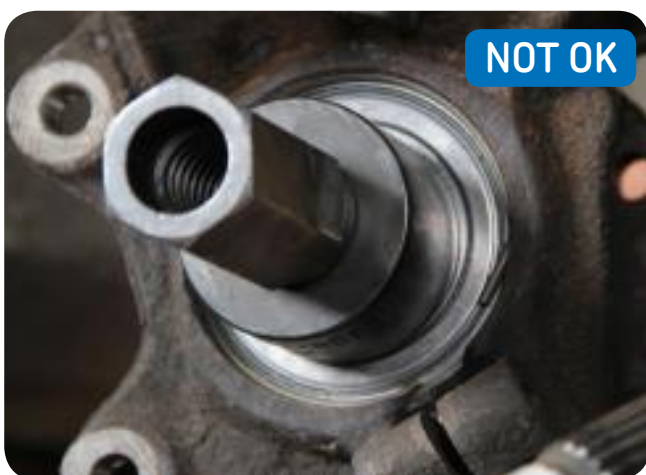


4. When installing the new HBU1 bearing into the knuckle, ensure that the paste/magnetic ABS sensor ring side is facing the ABS pickup sensor (if fitted). Apply equal pressure at 90 degrees, to the outer ring only, until the bearing is fully seated into the knuckle – under no circumstance should pressure be applied to the inner ring or seal, as doing so will damage the bearing. Then install the clip rings if required for the particular vehicle application being repaired.



Generic image – not VKBA 3496

5. Always follow vehicle manufacturers fitting and torque recommendations, when installing and tightening the components.
6. When pressing the drive flange into the bearing/knuckle assembly, **pressure should only be applied to the inner ring**. Again, any deviation from this will cause serious damage to the bearing!



Warning! Never reuse an old dismantled bearing after removing it from the vehicle.

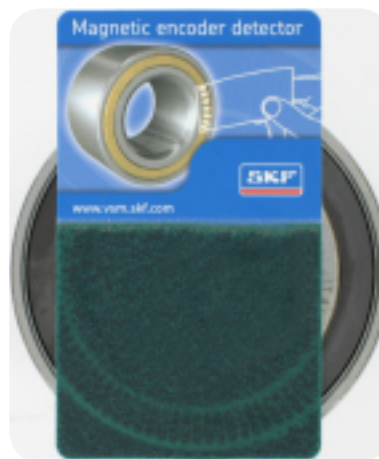
SKF Pole Position

This picture shows the result of a bearing that has been fitted incorrectly. **Note:** the particles of metal flake in the rolling elements and the bearing cage – this will lead to noise and eventually, completely damage the bearing.



Never use the old retaining nut!

The SKF VKBA 3496 kit comes with a new snap ring and retaining nut. Please use both when fitting this bearing!



Note: even though the VKBA 3496 bearing does not have a "magnetic sensor ring", many other bearings do. **Never** use a screw driver to test the bearings magnetic ring – use either a magnetic encoder detector, or a paper clip.



It is also considered good practice to check the driveshaft, constant velocity joint and boots for damage, cracks and age related wear. I.e. will the boots last until the next vehicle inspection?

© SKF is a registered trademark of the SKF Group.

© SKF Group 2012

The contents of this publication are the copyright of the publisher and may not be reproduced (even extracts) unless prior written permission is granted. Every care has been taken to ensure the accuracy of the information contained in this publication but no liability can be accepted for any loss or damage whether direct, indirect or consequential arising out of the use of the information contained herein.

PUB 80/11 12450 EN.GB • 2012

Printed on environmentally friendly paper.

