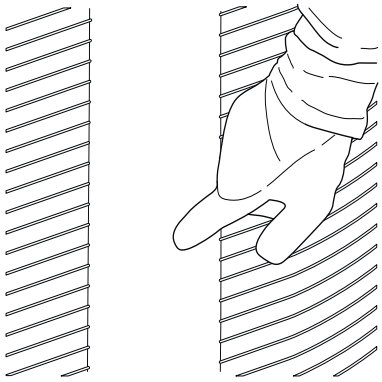
5.4.6 Bonding position in the tire

The correct position of the bonding surface is:

- In the middle of the tire inner layer.
- In the area of the DOT stamp.

GB
USA

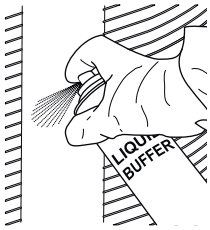


Dimensions of the bonding surface:	approx. 6 x 6 cm (2.4 x 2.4 in.)
Dimensions of the area to be cleaned:	approx. 7 x 7 cm (2.8 x 2.8 in.)

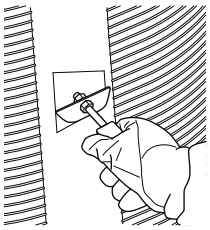
NOTE

- ▶ The rubber container with integral tire sensor must be able to be in full, flush contact with the bonding surface.
- ▶ Areas with protrusions or recesses which cause the rubber container to only contact the surface at individual points are not suitable for bonding.
- ▶ Remove ventilations ribs in the area of the bonding surface before the bonding process. See Chapter ***5.7 Removing ventilation ribs in the bonding area.***
- ▶ Avoid direct sunlight and drafts on the bonding area.

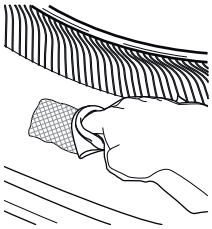
5.4.7 Pretreatment of the bonding surface



- Shake the spray can (e.g. Liquid Buffer).
- Spray the complete dry bonding surface to be cleaned with the cleanser from a distance of approx. 20 cm (8 in.).



- Immediately chip the bonding surface to be cleaned using the scraper under slight pressure and in different directions until the bonding surface is dry. Take care not to damage the tire inner layer.



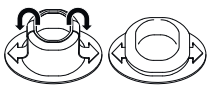
- Immediately clean the bonding surface to be cleaned thoroughly with the cleaning cloth. Wipe only in one direction and always use clean areas of the cleaning cloth. Do not rub any dirt or debris into the bonding surface.

- Repeat the cleaning steps until the bonding surface is optically free from residues.
- Mark the **outer edge** of the bonding surface with chalk.
- Allow the cleaned surface to breathe for approx. 3 minutes after the cleaning steps.

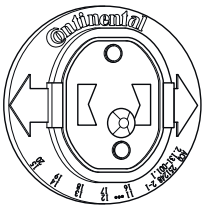
5.4.8 Installing the tire sensor in the rubber container

GB
USA

NOTE
▶ The tire sensor is normally supplied pre-assembled in the rubber container.

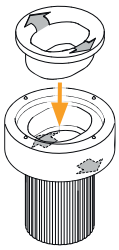


- Fold over the sealing lip of the rubber container.
- Wet the remaining surface in the container slightly with fitting paste.



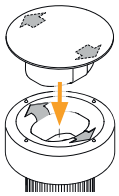
- Place the tire sensor in the rubber container.
- Fold the sealing lip of the container up again. The direction of rotation arrows on the container are continued on the sensor (see figure). The sealing lip of the container must lie uniformly on the top of the sensor around the circumference.

5.4.9 Inserting the rubber container with integrated tire sensor into the pressing tool

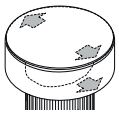


- Place the inlay part in the pressing tool so that the two arrows on the inlay part correspond with those on the pressing tool.

NOTE
▶ Do not use the pressing tool without the inlay part.



- Place the rubber container with integrated tire sensor in the inlay part so that the two direction of rotation arrows on the tire sensor correspond with those on the inlay part.



- The container base surface must be in contact with the press-in tool all round, otherwise check the position of the sensor in the container.

5.4.10 Cleaning the bonding surface on the rubber container

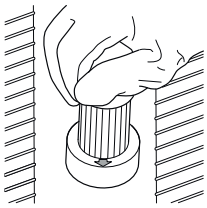
- Shake the spray can (e.g. Liquid Buffer).
- Spray the cleansing agent onto the cleaning cloth and wet the bonding surface.
- Then thoroughly clean the bonding surface using the cleaning cloth, always using a clean area of the cloth.
- Carry out this cleaning operation at least twice.
- Allow the cleaned surface to breathe for approx. 3 minutes after the cleaning steps.

5.4.11 Bonding in the rubber container with integrated tire sensor

GB USA

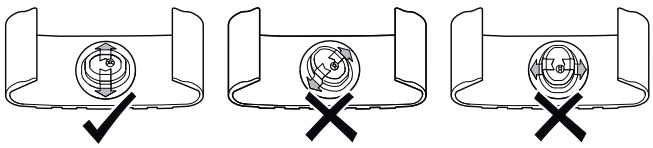
	NOTE
	▶ The Cyberbond 2250 adhesive contains a fluorescent agent which allows to check, if the right adhesive has been used, even after bonding.

- Check the position of the rubber container with integrated tire sensor in the pressing tool.
- Apply 1 unit (see graduation marks on flask) of the special adhesive to the bonding surface of the tire sensor and spread uniformly using the spatula.
- Immediately after applying the adhesive, press the rubber container with integrated tire sensor perpendicularly onto the cleaned bonding surface using the pressing tool. See Chapter ***5.4.6 Bonding position in tire*** for the correct positioning of the tire sensor on the tire inner layer.



- Press the rubber container with integrated tire sensor perpendicularly, firmly and steadily onto the tire inner layer with a weight of at least 5 kg (11 lbs.) for approx. 45 seconds using the press-in tool. **Do not tilt!**

The position of the tire sensor is correct when the arrows on the rubber container are facing in the direction of rotation of the tire.



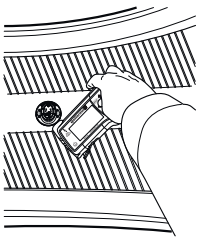
5.5 Final inspection of the bonding of the rubber container

- Inspect the bond visually. When bonded correctly, the rubber container with integral tire sensor is in full, flush contact with the inner layer of the tire.
- Carefully wipe away any remaining adhesive around the edge of the rubber container. Do not pull on the tire sensor or rubber container for (at least) the first 15 minutes.
- Before fitting the tire, activate the tire sensor using the hand-held tool. The tire can then be fitted on the wheel.

5.6 Tire sensor activation before fitting tire

Before the tire is fitted on the wheel, a function check of the tire sensor has to be carried out.

Proceed as follows:



- Call up menu item "Activate sensor" on the hand-held tool and confirm with "**OK**."
- Insert the hand-held tool into the tire directly next to the tire sensor.

This checks the function of the tire sensor and activates the sensor.

The following messages are possible:

Display	Meaning
"Tire sensor OK"	The function proper is confirmed. The tire can be fitted.
"Tire sensor not OK"	Replace the tire sensor.
"Battery too weak"	Replace the tire sensor.

5.7 Removing ventilation ribs in the bonding area

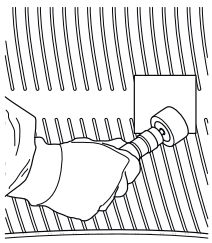
GB USA

	ATTENTION
	Material damage due to damage to the tire inner layer! Damage to the inner tire layer can cause impairment of the service life of the tire. ► Remove only the ventilation ribs. ► Have the work carried out only by personnel trained in tire repairs.

Tools required:

- Marking pen or chalk
- Goggles, protective gloves
- Slow-running pneumatic grinder
- Brass brush
- 65 mm (2.56 in.) contour disc
- Wet/dry vacuum cleaner

Proceed as follows:



◆ Mark the area of approx. 8 x 8 cm (3.15 x 3.15 in.) to be roughened with a marking pen or chalk.

◆ Roughen the tire inner layer using a contour disc, removing all the ventilation ribs in the bonding area until the surface is smooth. Press the contour disc only slightly and move continuously so that it does not remain in the same spot.

	NOTE
	► Create a rough patch of Type RMA 3 using the contour disc.

◆ Clean the roughened area with a brass brush.

◆ Completely remove all roughening dust with a wet/dry vacuum cleaner.

◆ Then continue the bonding process as described earlier. Avoid long waiting times.