

## The standard for electrically heated SCR lines – customized by VOSS

With electrically heated SCR lines from VOSS you are deciding in favor of a solution with the technical and economic benefits of a well-conceived heating concept that has been used a million times over in a host of applications.

### The VOSS heating concept

- ✓ Notably lower heating power demands and de-freezing times
- ✓ Secure de-freezing at the connection points with heated quick connectors and controlled heating wire routing
- ✓ No load on the on-board power supply from excess energy
- ✓ Heat buffer at the quick connector ends with air-pockets in the caps
- ✓ The AdBlue® (DEF) cannot compromise the heating element
- ✓ Efficient heating by a thermally buffered heating wire, which is installed externally on the tube
- ✓ 100% leak-proof, material bonded connection between tube and quick connector by means of laser welding
- ✓ Only a few installation steps and the utmost in process reliability
- ✓ Compressed development schedules and cost reduction with customized solutions using standard components
- ✓ Field experience with an installed base of more than 1 million lines
- ✓ < 6 ppm complaint rate

### Technical features

- ✓ Tube sizes 4x1, 5x1, 6x1 and 8x1 mm
- ✓ Hoses with ID 3.2 and 4.0 mm for applications with high demands on pulsation damping and frost expansion
- ✓ Suitable for Euro VI and successors
- ✓ No overheating even with emptied tubes due to outstanding thermal dissipation with outside heating
- ✓ Complete assortment of quick connectors in various sizes (1/4", 5/16", 3/8") in straight and elbow configurations (90° and other angles)
- ✓ High temperature configuration up to 160 °C (long term) and 180 °C (short term) due to choice of materials (no use of PA 12), joining technology and insulation
- ✓ < 100 mbar pressure differential for lines up to a length of 12,000 mm increases the service life of the AdBlue® (DEF) pump unit
- ✓ No noise emission from moving line components (essential for automotive applications), use of damping installation components
- ✓ Suitable, tested and approved for commercial vehicles and cars, as well as heavy-duty off-road applications; resistant to dirt, vibrations and high-pressure cleaning
- ✓ Purity levels compliant with automotive standards
- ✓ Operationally reliable high temperature burst pressures at temperatures up to 180 °C

