

# Liquid nitrogen service

Your mobile delivery service for small quantities



With its liquid nitrogen service, Messer offers a flexible **supply of up to 2000 litres.**

For this service, Messer has a fleet of small, specially equipped, easily manoeuvrable tank trucks that deliver orders of liquid nitrogen on an as-needed basis in small quantities of up to 2000 litres. We can deliver against individual orders or at regularly scheduled intervals.

With its extremely low temperature of  $-196^{\circ}\text{C}$ , cryogenically liquefied nitrogen has proven itself indispensable as a refrigerant in many areas of industry, medicine, research, in the laboratory or in molecular

cooking. These applications often need liquid nitrogen only intermittently, at different locations, or in small quantities. **In such cases, supply through our liquid nitrogen service is the most economical solution.**

Our service drivers fill your storage or transport tanks right there on your premises and support you with advice and assistance with any questions you may have concerning your application.

And when your liquid nitrogen requirements increase, our experts will be glad to advise you on the planning and installation of a liquid nitrogen supply system.

## Liquid nitrogen for many applications



### Industry

With its extremely low boiling point, liquid nitrogen is used as a refrigerant in a variety of industrial applications – for example, metal hardening, cold shrinking, rubber removal, pipe freezing or temporary ground freezing.

### Laboratory, research

Liquid nitrogen is used in cold tests and serves to cool vacuum units or special detectors. It is also required for the freezing and storage of cellular material and environmental samples.

### Medicine

With liquid nitrogen, biological material can be quick-frozen. It is used as a reliable refrigerant in cryobanks.

### Molecular cooking

Liquid nitrogen is also used in "cooking". Without its extraordinary properties, the imaginative recipes of molecular cooking would not be possible.



### Support

Liquid nitrogen can only be stored and transported in Dewars: special vacuum-insulated containers.

Messer offers suitable Dewars both for purchase and for lease. Your support specialist at Messer will be glad to advise you on which container is best for your application.

For application engineering work involving the use of liquid nitrogen, our experts will work with you to develop complete solutions.



### Safe handling of liquid nitrogen

Safety comes first at Messer. Liquid nitrogen is a liquid that boils at  $-196^{\circ}\text{C}$ . Only trained personnel may handle it. The safety-related technical instructions on the safety data sheet must be strictly observed. In particular, liquid nitrogen must be stored only in well-ventilated rooms. When handling liquid nitrogen, suitable personal protective equipment must be used, in order to prevent skin or eye contact.

### Delivery

Messer's specially equipped liquid nitrogen service vehicles have a storage tank with a capacity of up to 2000 litres. Our service employees fill your transport or storage tanks there at your location.



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Gases for Life

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