

# Clariscan



KONGSBERG



## High-performance Domed Sonar 975-21220000

Kongsberg Discovery's innovation in domed-sonar technology combines a wide-bandwidth composite transducer with a patented acoustic lens to provide unprecedented image clarity from a domed sonar head. The result is Clariscan - a high-performance, multi-frequency imaging sonar.

### The problem

Oil-filled domes were introduced to provide protection and eliminate flooding on traditional exposed transducer shafts.

This innovation solved flooding issues but introduced beam defocusing in two conditions: warm & shallow, and cold & deep. The beam defocusing effect becomes more extreme in warm, shallow water as temperature increases and in cold, deep water as depth increases.

### Our solution

We have designed an acoustic lens that maintains beam focus through operational temperature and depth changes, significantly improving sonar performance and resulting in images that are much sharper.

The Clariscan acoustic lens behaves like an optical contact lens, correcting refraction caused by oil in the dome.

### Performance where you need it

The Clariscan has a depth rating of 4000 m and is part of Kongsberg Discovery's 1171 series of sonar heads. It has been optimized to meet the requirements of deep-ocean applications. These sonar heads provide the highest level of image quality.

The telemetry is RS485 and RS232 compatible and is automatically sensed and configured at startup. The sonar head is configured and controlled using the MS1000 Software.

### FEATURES

- Depth rating: 4000 m
- Robust design
- New acoustic lens technology
- Improved image resolution and sharpness
- Improved operating range and frequency

### APPLICATIONS

- Target detection
- Infrastructure inspection
- Search and recovery
- Site inspection

