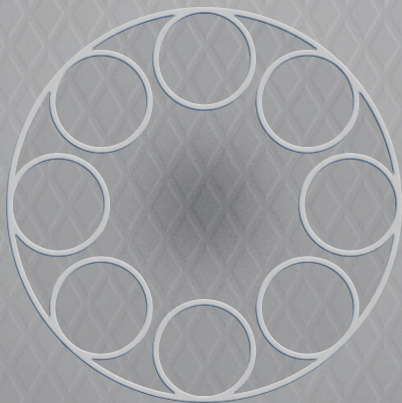


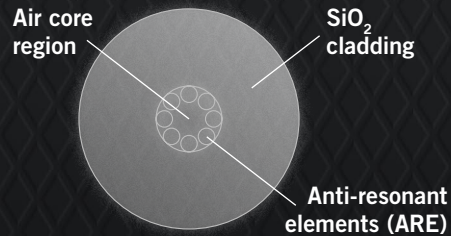
Break the Limits of Fused Silica

Discover Anti-resonant
Hollow Core Fibers



This groundbreaking fiber technology achieves unmatched beam quality and pulse integrity in high-power, ultra-short laser applications.

Anti-resonant Hollow Core Fibers set a new standard for high-power laser delivery. Designed to overcome fused silica limitations, they ensure ultra-short pulse integrity, high energy cw transmission, minimal distortion, and superior beam quality—perfect for medical, industrial, and precision sensing applications.



Properties

Optimized for high-power delivery of ultra-short laser pulses

Enables efficient transmission for demanding laser systems without compromising pulse quality.

Overcomes damage threshold limitations of fused silica

Provides a robust solution for high-energy applications where conventional fibers fail.

Superior mode quality for high-performance beam transmission

Ensures clean, stable beam profiles for precision processes and measurements.

Transmission window precisely tailored to e.g., 1,000–1,200 nm

Delivers maximum efficiency for applications operating in this specific wavelength range.

Minimal nonlinear effects for distortion-free propagation

Reduces unwanted interactions for consistent, high-quality signal transmission.

Ultra-low chromatic dispersion for pulse integrity

Maintains pulse shape and timing for accurate, distortion-free results.

Manufactured with the tightest tolerances for maximum consistency and reliability

Guarantees repeatable performance across all fibers for critical applications.

Applications



Medical & Sub-applications



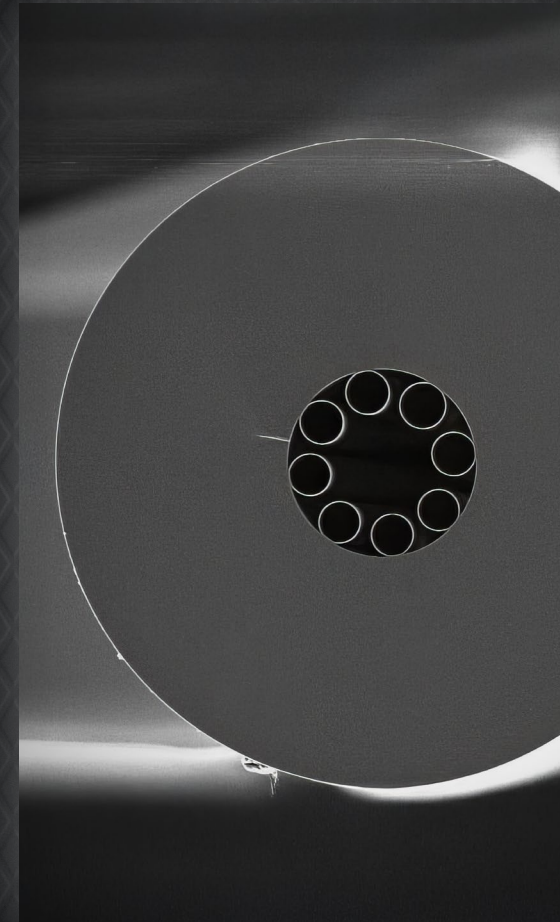
Industrial laser transmission



Gyroscopes



Your next challenge?



The data in this brochure is subject to change. The Heraeus logo, Heraeus and Covantics are trademarks or registered trademarks of Heraeus Holding GmbH or its affiliates. All rights reserved. For more specific information, visit covantics.com/brands. To learn about our locations, visit covantics.com/locations.

12/2025

HERAEUS COVANTICS HEADQUARTERS

Heraeus Quarzglas GmbH & Co. KG

Heraeusstraße 12–14

63450 Hanau, Germany

covantics@heraeus.com

covantics.com/contact

www.heraeus-covantics.com