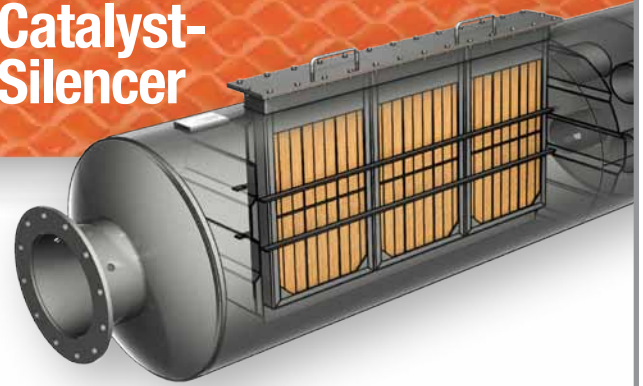


## HOUSINGS

# ZCS/ZHS/ZES Catalyst-Silencer


**WHY MIRATECH ZCS/ZHS/ZES?**
**Twice the Performance**

- Emissions
  - Up to 99% CO
  - Up to 99% CH<sub>2</sub>O/HAPs
  - Up to 90% VOCs
- Noise Control
  - ZCS: 25-30 dBA
  - ZHS: 30-35 dBA
  - ZES: 35-50 dBA

**Low Cost of Ownership**

- First-Time Permit Certainty
- Quick & Easy Maintenance
- High Performance, Long Life, High Value

**APPLICATIONS**

- **Lean-Burn Engines**
  - 1400 to 4500 hp
- **Natural Gas & LPG**
  - Gas Compression
  - Power Generation
  - Air Compression
  - Liquid or Petroleum Pumping

**FEATURES & BENEFITS**

- **Integrated Single-Unit Design**
  - Saves Space; Reduces Installation & Maintenance Costs
- **Saddle Mount Design**
  - Faster, Easier Installation & Maintenance
- **Fewer Components**
  - Reduced Part Costs
- **Flat-Top Bonnet™ Element Design, Improved Gasket Material**
  - Eliminates Blow-By & Enhances Catalyst Performance
- **Virtually Indestructible Metal-Monolith Element**
  - Superior Mechanical Strength, Thermal Durability & Handling Safety

**PRODUCT ADVANTAGE**

The MIRATECH ZCS/ZHS/ZES is an exceptional catalyst housing with an innovative design that makes element handling easy and safe. The ZCS/ZHS/ZES housing series incorporates VORTEX®, a catalyst manufactured with a revolutionary substrate, to create an element with static mixing, mass transfer and durability characteristics that are superior to other units in the industry. Plus, VORTEX® elements have an exclusive two-year warranty.

**INNOVATIVE DESIGN**
**Cost-Effective, Comprehensive Solution**

- Unique slide-in feature eliminates the need to 'lift and lock' catalysts into the housing so installation/removal is safer and easier
- Multiple element tracks allow users to operate stationary engines with as few as one or as many as six catalysts
- Single-layer catalyst design improves exhaust flow and lowers backpressure
- Replacement catalyst elements are easy to order and stock because one size fits any ZX-Series housing
- Developed to perform with a variety of OEM engines, including Caterpillar, Waukesha, Cummins and Jenbacher
- Specifically designed to function with lean burn natural gas engines ranging from 1400 to 4500 hp

The ZX-Series' slide-in feature, which does not rely on moving parts or a complex loading apparatus, allows users to safely and easily lift/install/remove catalysts. In addition, the housing's customizable configuration makes it possible for catalysts to be inserted vertically or horizontally.

- Incorporates VORTEX®, a catalyst with an advanced substrate that has multiple turbulent zones, superior stability, better CO reduction and a two-year element warranty, the only one in the industry
- Emissions reduction of:
  - Up to 99% CO
  - Up to 99% CH<sub>2</sub>O/HAPs
  - Up to 90% VOCs
- A patented, ergonomic 'easy-grab' Y-Top protects workers from injury by making it easier to maneuver catalysts into position
- ZX-Series uses a patented Y-Top element design with perimeter gasket sealing. The Y-Top virtually eliminates blow-by and leakage
- Customizable for all inlet and outlet configurations
- Can be arranged with full or half-panel catalysts
- Same-day shipping available
- Free washes for life
- Two year warranty


**Learn More: Phone · Email · Web · "The Emissions Monitor" Subscription**

NSCR · SCR · DPF · Silencers · AFRC · NESHAP CPMS · Field Service · Training · Turnkey