



KD Series™ Generators Specification Guide

80–300 kW



KD Series™ Generators

Built for the most critical jobs on earth.

KD Series™ Generators (80–300 kW) are ideal for mission-critical applications such as construction sites, emergency backup for commercial facilities, agriculture, telecom infrastructure, and remote operations where reliable, on-demand power is essential.

Quick Specs

KD SERIES GENERATORS	
kW Range (60 Hz)	80–300 kW
Engine Manufacturer	Rehiko
Displacement Range	4.5, 6.7, 8.9 liters
Cylinder / Arrangement	In-line 4 cylinder turbo, In-line 6 cylinder turbo
Bore Sizes	107 mm, 107 mm, 114 mm
EPA Rating	Tier 3

Exclusive Features

Innovative Design

- High-ambient standard cooling systems (50°C)
- KD Series generators utilize common rail injection systems for reliable performance
- Full accessory package options including circuit breakers, battery heaters, block heaters, battery chargers

Best-in-Class Performance

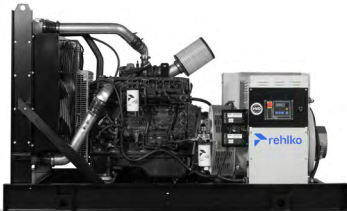
- Superior fuel efficiency, power density, fuel lift, exhaust flow, and many other performance standards
- Ideal for mission-critical applications such as construction sites, emergency backup for commercial facilities, agriculture, telecom infrastructure, and remote operations
- Two-year, 1000 run-hour warranty. With purchase of a five-year service contract through an authorized Rehiko distributor, warranty upgrades to a five-year comprehensive warranty

Tested and Certified

- Provides advanced short-circuit capability; Meets NEMA MG 1, IEEE, and ANSI standards; Multiple alternator options available
- Rehiko enclosures are built and manufactured at the same factory as the generator system—factory-certified UL2200, IBC seismic-certified, and OSHPD-certified
- EPA Tier 3 certified, as well as CSA, NFPA, IBC, ISO 8528-5 factory-certified



KD80



KD200



KD300

Specification Guide

This information will help you identify the characteristics you need to write a better specification—ultimately resulting in a better, more reliable product for your customer.

Rehiko KD Series Engine

FEATURES	BENEFITS
High-Pressure Common Rail (HPCR) fuel system	Efficient, Quiet Operation Maximizes fuel efficiency, reduces emissions, lowers noise, and provides seamless integration with advanced diagnostics
Full-authority electronic controls	Optimized, Integrated Performance Optimize operation, improve cost control, provide valuable performance data, and ensure smooth integration with other components
Advanced turbocharging technology	Responsive and Reliable Power Delivery Delivers faster transient response, improved power delivery across load ranges, and ensures reliable performance under varying conditions
Low-maintenance fuel filter assembly (with water separator & sensor)	Long-Life Serviceability Simplifies service with 500-hour filter life, top-load replacement, and built-in protection against fuel contamination
24-valve cylinder head	Enhanced Airflow and Power Four valves per cylinder improve airflow, enhance combustion efficiency, and deliver stronger power and responsiveness at every rpm
Compact 4.5L inline, 4-cylinder design (KD80/100/130)	High-Output, Space Efficient Provides a high power-to-weight ratio, enabling strong standby ratings up to 207 hp while maintaining versatility for industrial applications
Tier 3 emissions compliance	Regulatory-Ready Ensures regulatory compliance at 1800 RPM, meeting environmental standards and broadening market applicability

Cooling Sytem

FEATURES	BENEFITS
Engine is liquid-cooled by a closed-loop, unit-mounted radiator rated to operate the generator set at a full-load ambient temperature of 50°C (122°F)	Reliable in Extreme Conditions Minimizes cooling air and maximizes performance of the engine. With 50°C standard, the generator will be able to run in some of the harshest conditions
Standard mechanical fan drive, driven from the engine	Optimized Efficiency Right-sized cooling fans are selected for high efficiency to reduce noise and power draw, delivering maximum genset electrical output

Rehiko Controller: APM603

FEATURES	BENEFITS
Onboard paralleling allows paralleling of up to eight generator sets of mixed sizes and fuel types	Cost Savings Both load management and generator management, eliminating the need for a master control panel (MCP)
Load management supporting up to 16 loads per system on a single generator or paralleling system	Low-Cost Configurability Allows shedding of lower-priority loads if needed to ensure critical loads are always powered
Support for RS-485 ports for Modbus RTU, RJ45 Ethernet port for Modbus TCP, SNMP, or BACnet	Simplified Communication User flexibility for monitoring critical equipment
Meets UL6200 and NFPA 110, Level 1	Code Compliance Thermal and instantaneous current-limiting settings for alternator protection. Provides protection against line-to-line and line-to-neutral faults
Data logging automatically captures specific data	Easy Reporting Download and analyze generator operation data for reports like JCAHO
The generator set controller continuously monitors and stores critical operational data for 24 hours	Fast Troubleshooting Access to operational data to confirm proper operation and quickly troubleshoot system issues
Large, full-color touch-screen display with easy-to-use interface	Easy to Use Intuitively provides quick access to information
Stores data of critical operating parameters	Instant Access to System Data On-site troubleshooting is possible without a PC or the need to download the data to display elsewhere
Highlights all active faults and warnings; stores an event log of events, faults, and warnings	Detailed History of Events Provides clear insight into system issues with a detailed event history
Provides password access to protect modification of parameters by unintended users	Secure Data Protection Protects the generators from any tampering

Rehiko Controller: APM402

FEATURES	BENEFITS
Push button/rotary dial for menu navigation	Intuitive and Efficient User Interaction Push button and rotary dial for fast, precise navigation
Store up to 1000 events	Enhanced Diagnostic Accuracy Faster troubleshooting and diagnostics, minimizes down-time and supports better informed maintenance decisions
Supports Modbus RTU	Seamless integration with existing Systems Easy integration with reliable standardize communication with a wide range of PLCs, BMS and SCADA systems
Integrated hybrid voltage regulator	Optimized Voltage Stability Enhances generator performance providing consistent voltage output under varying load conditions

Warranty

FEATURES	BENEFITS
Two-year, 1000 run-hour warranty	Peace of Mind Better warranty to protect the customer against any unforeseen damage
With purchase of a five-year service contract through an authorized Rehiko distributor, warranty upgrades to a five-year comprehensive warranty	

Alternator

FEATURES	BENEFITS
Auxiliary Excitation System – An auxiliary winding on the stator supplies power to the AVR (Automatic Voltage Regulator), independent of the main output	More Reliable Ensures quick and stable voltage recovery during transient load changes (e.g., motor starting), enhancing performance in critical applications like telecom and hospitals
All alternators are brushless, using rotating excitation systems	Efficient Brushless Design Provides low maintenance and longer service life—ideal for remote or hard-to-access installations where uptime is crucial
Alternators are designed with a compact footprint and modular construction	Compact and Modular Build Allows easy integration saving space and simplifying logistics, installation, all into a smaller package
Digital AVR combined with the excitation system allows precise voltage regulation typically within ±1%	Superior Voltage Regulation Provides clean, stable power output essential for sensitive electronic loads or variable load profiles
Alternators comply with international standards (CE, UL, ISO 8528.)	Globally Certified and Compliant Supports global export opportunities and gives end-users confidence in product reliability, safety, and compatibility with local standards
Additional excitation power provided during startup	Enhanced Motor Starting Capability Delivers high short-circuit and motor starting performance, reducing voltage dips and enabling smooth startup of large inductive loads like compressors, pumps, or HVAC systems

Optional Accessories

PMG

- PMG excitation is available as an option when specified by the project requirements– for enhanced voltage regulation, motor starting, or non-linear load applications

Space Heater

- Optional alternator space heater prevents internal condensation during standby periods—ideal for humid or cold environments where moisture can compromise insulation integrity and reduce generator lifespan

Rehlko Skin-Tight Enclosures

FEATURES	BENEFITS
All enclosure parts receive a 100% epoxy primer electrocoat (e-coat) with high-edge protection	Advanced Protection Rehlko corrosion-resistant epoxy coating system can lead to a longer life for the generator and keep aesthetics in high-quality shape for longer
Internal exhaust system (including muffler)	Space-Efficient and Quieter A fully integrated exhaust system not only saves space, but also cuts down on the noise emitted by the unit
All enclosures surpass a 3,000-hour salt spray corrosion test per ASTM-B117 and are capable of meeting 200 mph wind load	Superior Durability In the harshest conditions and towns with governmental limits, Rehlko enclosures stand up to the elements
Every enclosure is UL2200-certified from the factory and IBC-certified, if required	Tested and Approved No on-site certification necessary; most certifications are done in our factory

