





Generator Set Data Sheet

MPG450KVA

PK@50Hz 450KVA/360KW





Main Features





PERKINS 2506A-E15TAG1



400/230V, 380/220V



3 phase 50 Hz





6CYLINDERS



62 LITRE



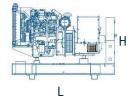
58 LITRE

Standby Power: 500 KVA - 400 KW

Open Skid

Length (L) 350 cm Height (H) 215 cm Width (W) 125 cm Weight 3500 kg **Daily Tank** 415 L

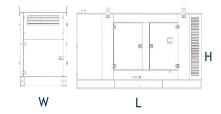




Prime Power: 455KVA - 364 KW

Sound Proof

460 Length (L) cm Height (H) 243 cm Width (W) 140 cm 5377 Weight kg 740 L **Daily Tank**



Acoustic pressure level @3m

<u>79 d</u>BA

ENGINE: PERKINS 2506A-E15TAG1

Engine power output 396 kWm-531 hp Cooling System Water Cooled Displacement / Capacity 15.2 Liter No. of cylinders

Cylinder Arrangement Vertical In line

Induction System Turbocharged and air to air charge cooled

Bore and Stroke 137 x 171 mm Cycle 4 stroke **Combustion System** Direct Injection **Compression Ratio** 16:1 nominal

Rotation Anti-clockwise, viewed on flywheel

Frequency and Engine Speed 50Hz & 1500rpm Starting voltage 24V Governor Electronic Oil capacity 62 Liter **Coolant capacity** 58 Liter 24 V D.C. starter and charge alternator

Replaceable fuel filter, oil filter and dry element air filter

Cooling radiator and fan

Starter battery (maintenance free)

Fuel consumption at 100% load 95 L/hr. Fuel consumption at 75% load 72 L/hr. Fuel consumption at 50% load 50 L/hr.



MPG 450KVA PK@50Hz 450kVA/360 kW Powered by Serkins Perkins



ALTERNATOR: LEROY SOMER

Rating	500KVA	Model	TAL047C
No. of bearing	1	Insulation class	Н
		Wires	6
Total Harmonic Content	<3.5% on load	Excitation System	SHUNT
Ingress Protection	IP23	AVR Model	R150
Winding Pitch	2/3(n° 6)		
Over-speed	2250 mn ⁻¹	Voltage Regulation	±1%
Circuit Breaker Capacity	MCCB 800Amps		

STANDARD CANOPY

Sound Level 79 dBA @ 3 meters in free space

Design Rigid canopy base manufactured by black steel metal sheets welded on canopy body with internal Re-

enforcement and bolted on the body.

5 service doors with stainless steel door locks.

Stainless steel heavy duty door hinges.

Black steel canopy body - 2mm and 3mm treated with greasing phosphate and anticorrosion treatment with

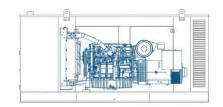
electro static power coating.

Connection Flexible

Sound isolation Rockwool with perforated sheets

Muffler Muffler with rain cap





CONTROL (MONITORING) SYSTEM: DEEP SEA

Control panel model

DSE6010

The DSE6010 is an Auto Start Control Module for single gen-set applications. It includes a backlit LCD display which clearly shows the status of the engine all the times. This module can either be programmed using the front panel or by using the DSE configuration suite PC software.

Metering and Alarm indications

- Generator frequency
- Under-speed, Over-speed
- Generators volts (L-L, L-N)
- Generator current
- Engine Oil pressure
- Fail to start/stop
- **Emergency stop**
- Failed to reach loading voltage / frequency

- Engine coolant temperature
- Fuel level (warning or shutdown) Optional
- Hours run counter
- Battery volts
- Charge fail
- Low DC voltage
- CAN diagnostics and CAN fail/error

Gen-sets can be equipped with different control panels depending on usage, such as: DSE6020, DSE7310, DSE7320 or DSE8610 (Synchronization Panel)



MPG 450KVA

PK@50Hz 450kVA/360 kW





OPTIONAL EQUIPMENTS

ATS (Automatic Transfer Switch) **Alternator Anti-condensation Heater**

Water Jacket Heater Load Bank

Electrical Fuel Level Sensor Battery Charger Fuel Level Protection Fuel Water Separator

Electrical Fuel Transfer Pump Spare Parts

Battery Heater Oil Heater

STANDARD SPECIFICATIONS

Warranty	All generating sets are covered under warranty policy for a period of 12 months in line with the manufacturers' warranty policy				
Quality Standards	The equipment meets the following standards: BS4999, BS5514, IEC 60034, VDE0530, NEMA MG 1.22 and ISO 8528				
Engine Filtration System	Air filter, Fuel filter, Oil filter. All filters have replaceable elements				
Fuel System Cooling Radiator Exhaust System	On generating sets up to 650KVA, the base frame design is incorporated with an integral fuel tank with a capacity of approx 8 hours running at average load. The tank is supplied with fill cap breather, fuel feed and return pipes to the engine and drain plug Radiator and cooling fan, complete with safety guards, designed to cool the engines at high ambient temperatures Heavy duty industrial exhaust silencer Silencer noise reduction level: 22 (dB) Maximum allowable back pressure: 10 (kPa)	Mounting Arrangement	Base Frame: The complete generating set is mounted as a whole in a heavy duty fabricated steel base frame. Coupling: The engine and alternator are directly coupled by means of an SAE flange. The engine flywheel is flexibly coupled to the alternator rotor Anti-Vibration Mounting Pads: Anti-vibration pads are affixed between the engine/alternator feet and the base frame thus ensuring complete vibration isolation of the rotating assembly Safety Guards: The fan & fan drive along with the battery charging alternator are safety guard protected for personnel protection		
Documentation	Operation & Maintenance manual, circuit wiring diagrams and commissioning / fault finding instruction leaflets are accompanied with the generator	Factory Tests: Equipment Finishing:	The generating set is load tested before dispatch. All protective devices control functions and site load conditions are simulated. The generator and its systems are checked before dispatch All mild steel components are fully degreased and painted with powder coated paint to ensure maximum scuff resistance and durability		
Assembled in facilities certified to ISO 9001					