



Generators
Small Range

Perkins
THE HEART OF EVERY GREAT MACHINE

STAMFORD
power generation

Ratings
@ 0.8 PF

50 Hz
1500 RPM

VOLTAGE	PRIME RATING	STANDBY RATING
400/3 Ph	20 KVA	22 KVA

NOTES

Prime Power

Unlimited hours usage with an average load factor of 75% of the published Prime power over each 24 hours period.

A 10% overload is available for 1 hour in every 12 hour operation.

Standby Power

Limited to 500 hours annual usage.

Available in 60HZ for all voltage ratings

Standard Reference Conditions

Note: Standard reference conditions 40°C (104°F) Air inlet temp, 100m (328 ft.) A.S.L. 30% relative humidity.

Standards Compliance



Dimensions

	Open Type	Silent	Super Silent
Length:	1300mm	1980mm	2450mm
Width:	750mm	780mm	870mm
Height:	1150mm	1280mm	2450mm
Weight:	420kg	700kg	900kg

Technical Data

Diesel Generating Set



GENSET Make / Model	PERKINS 404A-22G1
Alternator Make / Model	Stamford Tech 184ES
Control Panel	DSE 4520
Base Frame / Canopy	Robust Structure / Corrosion Resistant
Circuit Breaker Type	3-Pole MCCB (4-Pole Available as option)
Built-In Fuel Tank Capacity (Silent)	50 L
Battery	50 A

Engine Specifications

Make & Model	PERKINS 404A-22G1
Cylinder & Arrangement	4; Vertical in-line
Cycle	4 stroke
Induction System / Aspiration	Naturally Aspirated
Cooling System	Water cooled
Governing	Mechanical
Governing Class	G2 - ISO 8528 Part 1
Compression Ratio	23.3:1
Displacement	2.216
Bore & Stroke	84 x 100 mm
Dynamic Charging Alternator	15 AMP, 12 V

Lubrication System

Oil Filter Type	Spin-On Full Flow
Total Oil Capacity	10.6 L
Oil Type	API CI-4

Cooling System

Total Coolant Capacity	7.0 L
Cooling Fan Air Flow	0.59 m ³ /s
Max Water Temperature	112°C
Cooling System Design	50°C
Heat Radiation to Room	4.4 kW

Air System

Air Filter Type	Dry Element
Max Air Filter Intake Restriction	3kPA

Exhaust System

Muffler Type	Industrial Grade
Max Back Pressure	10.2 kPa
Exhaust Gas Flow	3.94 m ³ / min
Exhaust Gas Temperature	≤505° C



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Gen sets
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Engine Fuel System

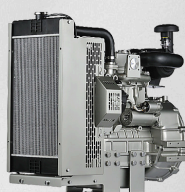
Recommended Fuel	Class A2 Diesel
Fuel Consumption Standby	6.1 L/hr
Fuel Consumption @100% PRP	5.3 L/hr
Fuel Consumption @75% PRP	4.0 L/hr
Fuel Consumption @50% PRP	2.9 L/hr

Alternator Specifications

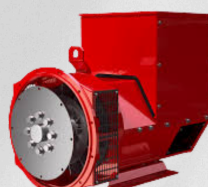
Alternator Make / Model	Stamford Tech 184ES
AVR Model	SX460
Number of Poles	4
Number of Winding Leads	6
Type of Bearing	Single Bearing
Excitation System	Self Excited
Ingress Protection Rating	IP23
Cooling Airflow	0.095 m ³ / Sec
Voltage Regulation	±1%
Harmonic Coefficient THF	< 2%
Tel. Influence TIF	< 50
Insulation Class	H



Controller



Engine



Alternator



Saccal Enclosure / Canopy

Controller Make / Model	Deep Sea 4520
Operation Mode	Auto-Start & AMF
Display	Graphic Backlit LCD (128x64px)
Ingress Protection Rating	IP65
Binary Inputs/Outputs	4/4
Analog Inputs	3
Measurements	Vac, A, Hz, KVA, KW, Vdc
Event Log	Alarms Log, Hrs Log
Communication	USB

Canopy Type	SILENT	SUPER SILENT
Enclosure Type	Acoustic & Weatherproof	
Drainage	Fuel and Water Drainage Provision	
Transportation	Tested Single Point Lifting Facility & Forklift Pockets	
Ingress Protection	IP23	
Lifting	ISO Standard Lifting	
Canopy RAL Color	RAL 9002 - Powder Coated	
Base Frame RAL Color	RAL 9005 - Powder Coated	
Noise Pressure Level db(A) @ 1m @75% Load	71	65

SACCAL TOOL BOX

Standard for every GenSet

- Heat Resistant Gloves
- Notebook
- Pen
- Tape Measure
- Baseball Cap
- Operation Manual
- Wiring Diagrams
- Sound Test (Upon Request)

Why Saccal Generators ?

Saccal Industries is one of the leading diesel generator OEM firms in the **MENA** Region

With an impressive factory that spreads over an area of 30 thousand square meters in Bekaa & ISO certification, SACCAL has always been the leading name in the manufacturing and assembly of premium quality generating sets.

From planning and design, construction and production, to local and international sales, Saccal has more than 80 Years of experience.

Choose Right - Choose **Saccal**



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