

Generator set
Sound-proof type
SG7KS-AU

SPECIFICATIONS





1 Standards & Conditions

Design Standards

The designs and the productions are in conformity with:

- Conformite Europeenne (CE)
- ISO8528-5:2005
- AS 3000-2018
- AS 3010-2017

Environmental Operating Conditions

- Installation place: Outdoors or indoors (well ventilated).
- Ambient temperature: -25°C to 50°C. The coolant heater is needed when the temperature is below 5°C
- · Humidity: Less than 90%.
- Altitude: Below one thousand (1000) meters above sea level.

Factory Inspection

- Inspection items.
- · Protection devices working test.
- · Starting ability in normal temperature.
- 50% rated power load moment capability.
- Voltage deviation and speed variation: 0%, 25%, 50%, 75%, 100%, 110% Load.

Painting Process

- Painting process specifications and colors are based on the manufacturer's standard.
- The customer could also choose the color which the manufacturer offers.

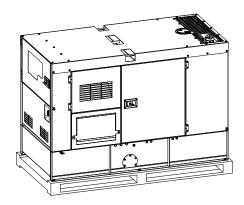
2 General Features

- Kubota engine D905-BG
- Close coupled to LSA alternator LSA40VS1
- Microprocessor control module PLC-920
- SCHNEIDER main circuit breaker: 32A
- Rotate speed governor: Mechanical governor
- Excitation system: Self excited, SHUNT
- A.V.R model: R220
- Key switch
- Emergency stop switch
- ATS(automatic transfer switch)receptacle

- Remote run connector
- 1x12V/60AH sealed for life maintenance free battery
- · Lockable battery isolator switch
- Powder coated canopy
- 45°C radiator
- · Steel base frame
- Vibration isolators between the engine/alternator and base frame
- · Dry type air filter
- · Base fuel tank for 38 hours running
- · Drain points for fuel tank
- · Operation Manual / Specifications

3 Equipment

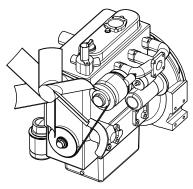
General technical data



Model	SG7KS-AU
Tank capacity	80L
Dry weight	560kg
Sound pressure level @ 7m	63dB(A)
Dimensions L×W×H	1450x640x950mm
Standby Power	7.5kVA/6kW
Prime Power	6.6kVA/5.3kW

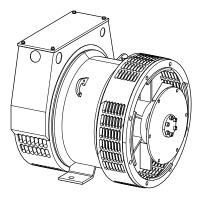
Voltage 220V		2	230V		240V		
Ampere	30.0A		28	28.6A		27.5A	
Genset Fuel Consumption							
Frequency/Load		25%	50%	75%	100%	110%	
50Hz (L/h)		N/A	1.1	1.6	2.1	2.3	

Diesel engine



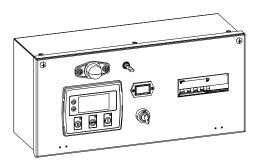
Engine Manufacturer/Brand	KUBOTA
Engine Model	D905-BG
Dimensions L×W×H	551×395×605mm
Dry Weigh (approx.)	93Kg
Number of Cylinders	3
Bore	72mm
Stroke	73.6mm
Displacement	0.898L
Compression Ratio	23
Type of injection	Direct injection
Intake System	Natural aspirated
Intake Resistance	≦1.96kPa
Cooling System	Water cooled
Fan	Pusher
Battery Voltage	12V
Type of Fuel	No.2-D (ASTMD975)
Type of Oil	APICD
Oil Capacity	5.1L
Type of Coolant	Glycol mixture
Coolant Capacity	N/A
Back Pressure	≦7.07kPa
Standby Power	7.4kW
Prime Power	6.6kW
Fuel Consumption(100%load)	2.1L/h

Alternator



Alternator Manufacturer/Brand Leroy Som Alternator Model LSA40VS Exciter Brushles Cooling Fan Cast alloy aluminu
ExciterBrushle
Cooling Fan Cast alloy aluminu
,
Windings100% copp
Insulation Class
Winding Pitch2
Terminals
Drip ProofIP2
Altitude≤1000
Overspeed2250rp
Air FlowN
Voltage Regulation±1.0
Total Harmonic TGH / THCat no load < 1.5 % - on load < 5
Telephone InterferenceTHF<2%;TIF<5

PLC-920 Control System

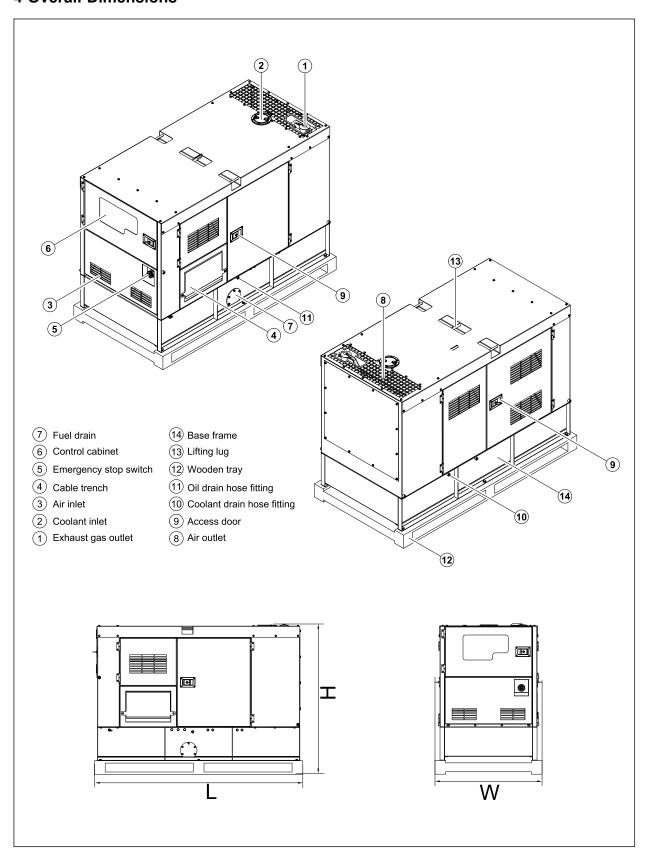


PLC-920 is an advanced control module based on microprocessor designed to control the engine via push buttons on the front panel. The module is used to start and stop the engine and indicate fault conditions, automatically shutting down the engine and giving a true first up fault condition of an engine failure.

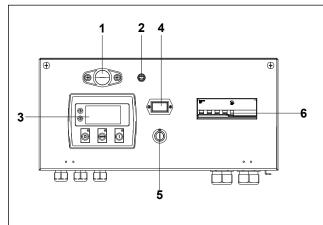
Standard Control Function

- Manual Engine Control Module
- Low Oil Pressure
- High Engine Temperature
- Auxiliary Shutdown
- Overspeed Protection
- Protection hold-off timer
- Charge Failure warning

4 Overall Dimensions



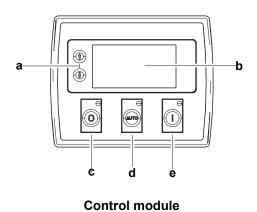
5 Control System



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Ref.	Description
1	Control cabinet lamp
2	Control cabinet lamp switch
3	Control module
4	Time counter
5	Key switch
6	Main circuit breaker
7	Live wire terminals
8	Neutral wire terminal
9	Ground wire terminal
10	Mains input/remote communication connector

Control & field wiring cabinet



Ref.	Description
а	Navigation button£» Accept (Configuration mode only)
b	Main status display
С	Stop/reset button£» Next page (Configuration mode only)
d	Auto start button£» Decrease value/next item (Configuration mode only)
е	Start button£» Increase value/next item (Configuration mode only)

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