



HBD550S

GENUINE PRODUCT OF  
HYUNDAI CORPORATION

# BALANTY

## 1 Standards & Conditions

### Design Standards

The designs and the productions are in conformity with:

- Conformance Européenne (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 45°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.

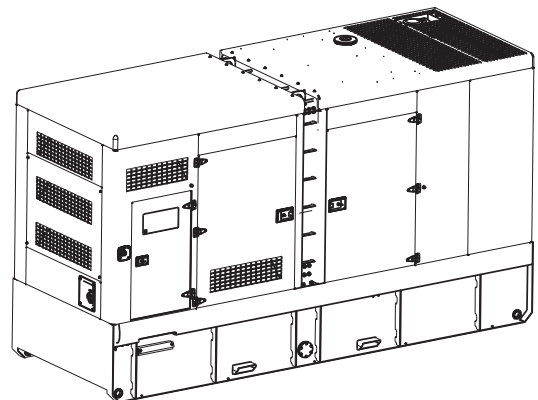
## 2 General Features

- Baudouin engine 6M21G550/5
- Close coupled to Hyundai alternator HK544D
- Microprocessor control module DeepSea 6120
- ABB main circuit breaker: 800A, 4P
- Rotate speed governor: ECU
- Excitation System: SHUNT
- A.V.R.Model: R250
- Key switch
- Emergency stop switch
- ATS (automatic transfer switch) receptacle
- Remote run connector
- 2x12V sealed for life maintenance free battery

- Lockable battery isolator switch
- Powder coated canopy
- 50°C radiator
- Oil pump on the engine
- Non-returning valve for fuel inlet hose of the engine
- Steel base frame with forklifts
- Vibration isolators between the engine/alternator and base frame
- Dry type air filter
- Base fuel tank with 13 hours running
- Drain points for fuel tank
- Breather valve for fuel tank
- Operator's Manual / Specifications

## 3 Equipment Specification

### General technical data

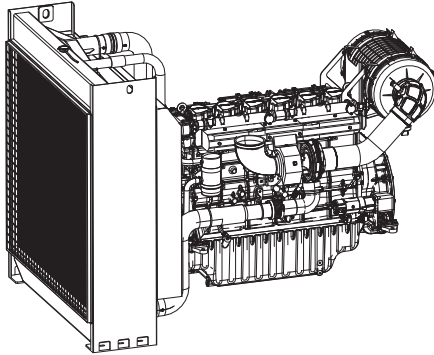


Model.....	HBD550S
Structure type .....	R
Tank capacity.....	1250L
Dry weight.....	5052kg
Noise level @7m .....	75.0dBA
Dimensions L×W×H.....	4520x1635x2536mm
Standby Power .....	550kVA/440kW
Prime Power .....	500kVA/400kW

Voltage	380V	400V	415V	440V	
Ampere	759.7A	721.7A	695.6A	656.1A	
<b>Genset Fuel Consumption</b>					
Frequency/Load	25%	50%	75%	100%	110%
50Hz (L/h)	29.2	51	75.3	109	119

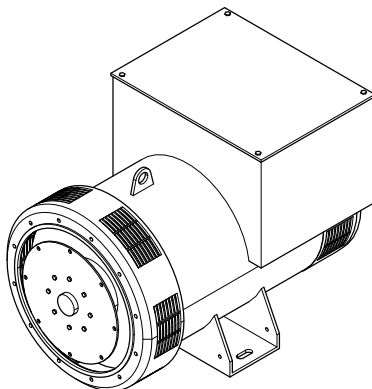


## Diesel Engine



Engine Manufacturer/Brand.....	Baudouin
Engine Model.....	6M21G550D/5
Dimensions L×W×H.....	2032x1232x1490mm
Dry Weigh (approx.) .....	1190kg
Number of Cylinders.....	6
Bore.....	127mm
Stroke .....	165mm
Displacement.....	12.54L
Compression Ratio.....	15.2
Type of Injection .....	High Pressure Common Rail
Intake System.....	Turbocharged and aftercooled
Intake Resistance.....	≤ 7.0kPa
Cooling System .....	Water cooled
Fan .....	Pusher
Battery Voltage .....	24V
Type of Fuel.....	BS2869 class A2 or BS EN590
Type of Oil .....	API CH4 15W/40
Oil Capacity .....	38L
Type of Coolant .....	Glycol Mixture
Coolant capacity.....	62L
Back Pressure .....	≤ 12kPa
Standby Power .....	490kW
Prime Power .....	450kW
Fuel Consumption(100%load).....	99.2L/h

## Alternator



Alternator Manufacturer/Brand .....	Hyundai
Alternator Model .....	HK544D
Exciter.....	Brushless
Cooling Fan .....	Cast alloy aluminum
Windings.....	100% copper
Insulation Class .....	H
Winding Pitch .....	2/3
Terminals .....	6
Drip Proof .....	IP23
Altitude.....	≤1000m
Overspeed .....	2250rpm
Air Flow.....	1m³/s(50Hz),1.2m³/s(60Hz)
Voltage Regulation .....	±0.5%
Total harmonic TGH / THC at no load < 4 % - on load < 4%	
Telephone Interference.....	THF<2%;TIF<50

## Deepsea 6120 Control Panel

PLC-500 is a microprocessor based control unit containing all necessary functions for protection of the genset and the breaker control. Furthermore, it contains all necessary three-phase measuring circuits and presents all values and alarms on the LCD display. The module has the function of load sharing which enables the module to share the active load (kW) equally when operating in parallel with other gensets. The load sharing is performed so each genset takes a portion of the load that is calculated in percent according to the nominal power.

- Microprocessor control, with high stability and credibility
- Monitoring and measuring operational parameters of the genset
- Indicating operation status, fault conditions, all parameters and alarms
- Multiple protections; multiple parameters display, like pressure, temp. etc.
- Manual, automatic and remote work mode selectable
- RS232 & RS485 can be used at the same time
- Real time clock for time and date display, overall runtime display, 250 log entries

## 4 Overall Dimensions

