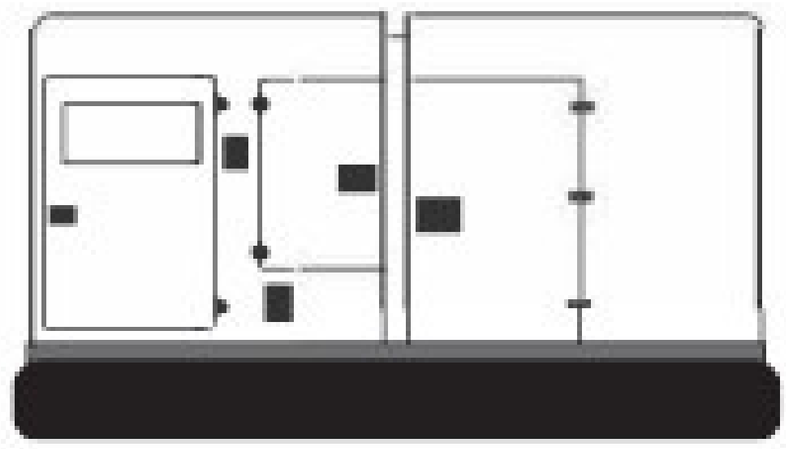
ZENITH

THE PINNACLE OF POWER

ZPDG260S

SPECIFICATIONS

www.zenithpowerltd.com



ZPDG260S

50 Hz @ 1500rpm, 3-phase/4-wiring

Standards & Conditions

Design Standards

The designs and the productions are in conformity with:

- Conformite Europeenne (CE)
- China Compulsory Certification (CCC)
- ISO8528-5:2005
- GB/T2820.5-2009

Environmental Operating Conditions

- Installation place: Outdoors or indoors (well ventilated)
- Ambient temperature: -25 degrees C TO 45 degrees C. The coolant heater is needed when the temperature is below 5 degrees C
- Humidity: Less than 80%
- Altitude: Below one thousand (1000) metres.

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 colours are based on the manufacturer’s standard.
- The customer could also choose the colour which the manufacturer offers.

General Features

- Perkins engine 1206A-E70TTAG3
- Close coupled to a Leroy Somer alternator TAL-A46D
- Microprocessor control module DSE-7420
- Main circuit breaker: 400A
- Rotate speed governor: Electronic fuel injection governor
- Excitation System: Self excited, SHUNT
- A.V.R.Model: R250
- Key switch
- Emergency stop switch
- ATS (automatic transfer switch) receptacle
- 2 x 12V/120AH sealed for life maintenance free battery
- Lockable battery isolator switch
- Powder coated canopy
- 50 degrees C, radiator
- Oil pump on the engine
- Steel base frame with forkslots
- Vibration isolators between the engine/alternator and base frame
- Dry type air filter
- Base fuel tank for 10 hours running
- Drain points for fuel tank
- Operation Manual/Specifications

Equipment Specifications

General technical data

Model : ZPDG260S

Tank capacity: 520L

Dry weight: 3097kg

Noise Level: @ 7m: 74.3 dBA

Dimensions LxWxH: 3840*1362*2002mm

Standby Power: 260kVA/208kW

Prime Power: 250kVA/200kW

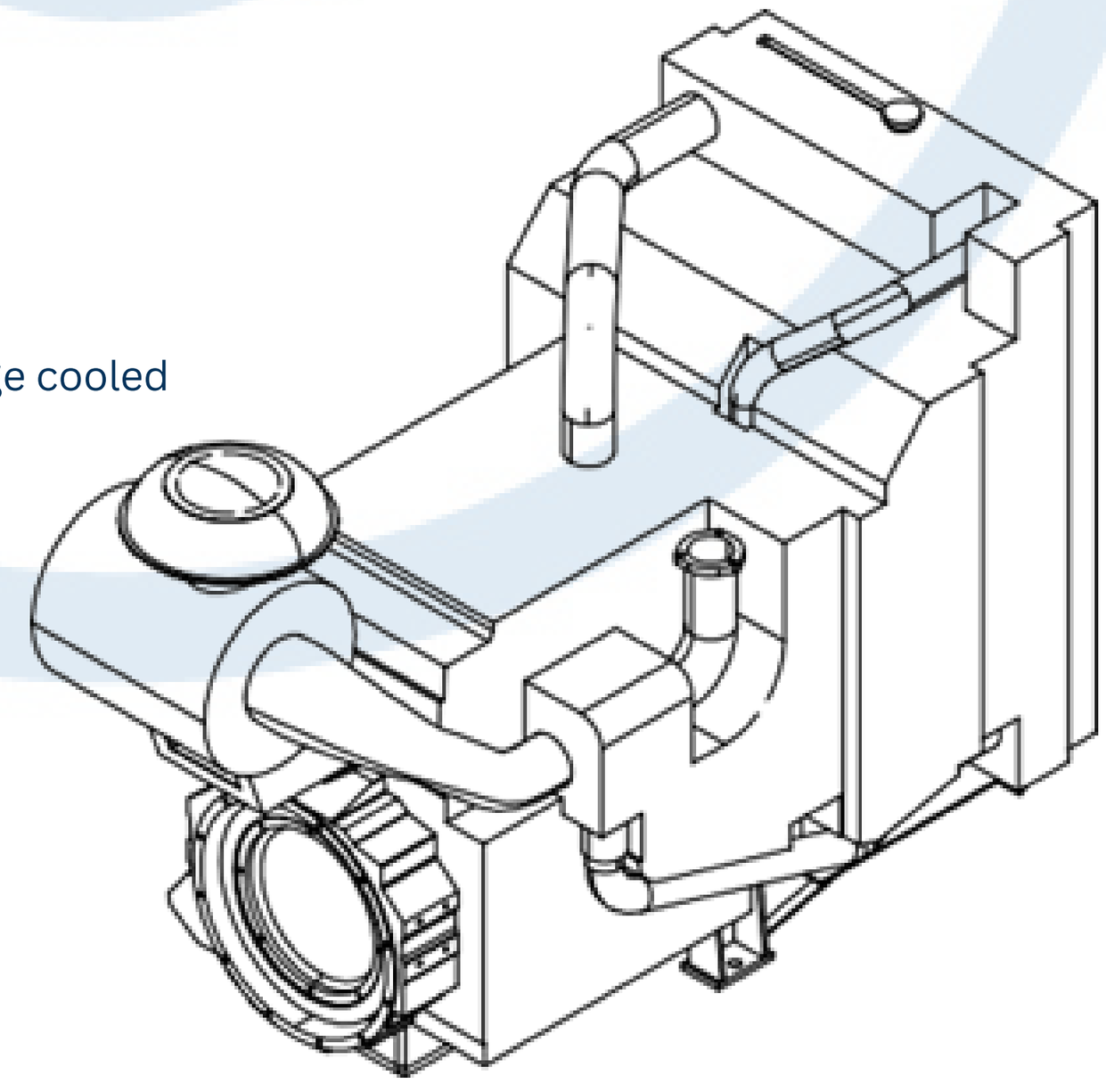
Voltage	380V	400V	415V	440V
Ampere	379.8A	360.9A	347.8A	328.1A

Genset Fuel Consumption					
Frequency/Load	25%	50%	75%	100%	110%
50Hz (L/h)	N/A	23.5	34.7	45.8	51.0

Power System

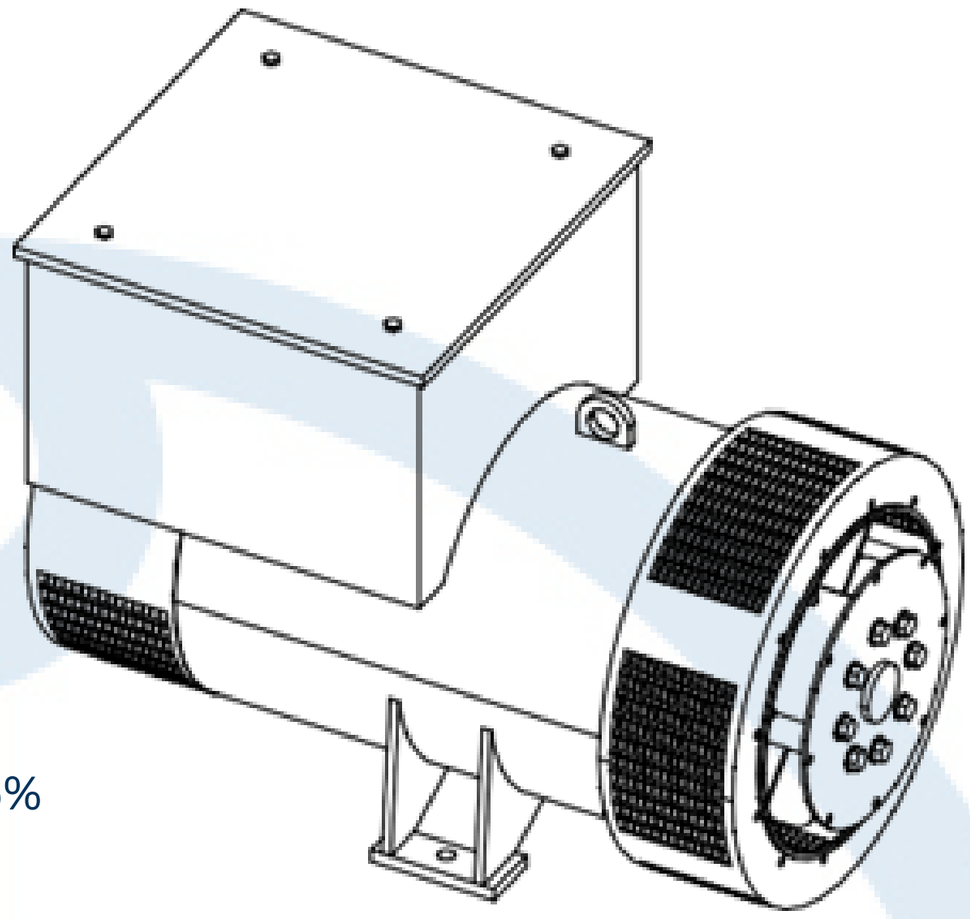
Engine

Engine Manufacturer/Brand: Perkins
Engine Model: 1206A-E70TTAG3
Dimensions: 1895×995×1372mm
Dry Weigh (approx.) : 808kg
Number of Cylinders: 6
Bore: 105mm
Stroke: 135mm
Displacement: 7.1L
Compression Ratio: 15.8
Type of injection: Direct injection
Intake System: Turbocharged, air-to-air charge cooled
Intake Resistance: 6.22kPa
Cooling System: Water cooled
Fan: Pusher
Battery Voltage: 12/24V
Type of Fuel: EPA 2D 89.330-96
Type of Oil: API-CH-4, API-CG-4 or ACEA E3
Oil Capacity: 13-16L
Type of Coolant: Glycol mixture
Back Pressure: 10.7kPa
Standby Power: 204.2kWm
Prime Power: 185.8kWm
Fuel Consumption(100%load): 45.8L/h



Alternator

Alternator Manufacturer/Brand: Leroy Somer
Alternator Model : .TAL-A46D
Exciter: Brushless
Cooling Fan: Cast alloy aluminium
Windings: 100% copper
Insulation Class: H
Winding Pitch: 2/3
Terminals: 12
Drip Proof: IP23
Altitude: ≤1000m
Overspeed: 2250rpm
Air Flow: 0.43m³/s(50Hz),0.51m³/s(60Hz)
Voltage Regulation: ±0.5%
Total harmonic TGH / THCno load < 2.5 % - on load < 2.5%
Telephone Interference: THF<2%;TIF<50

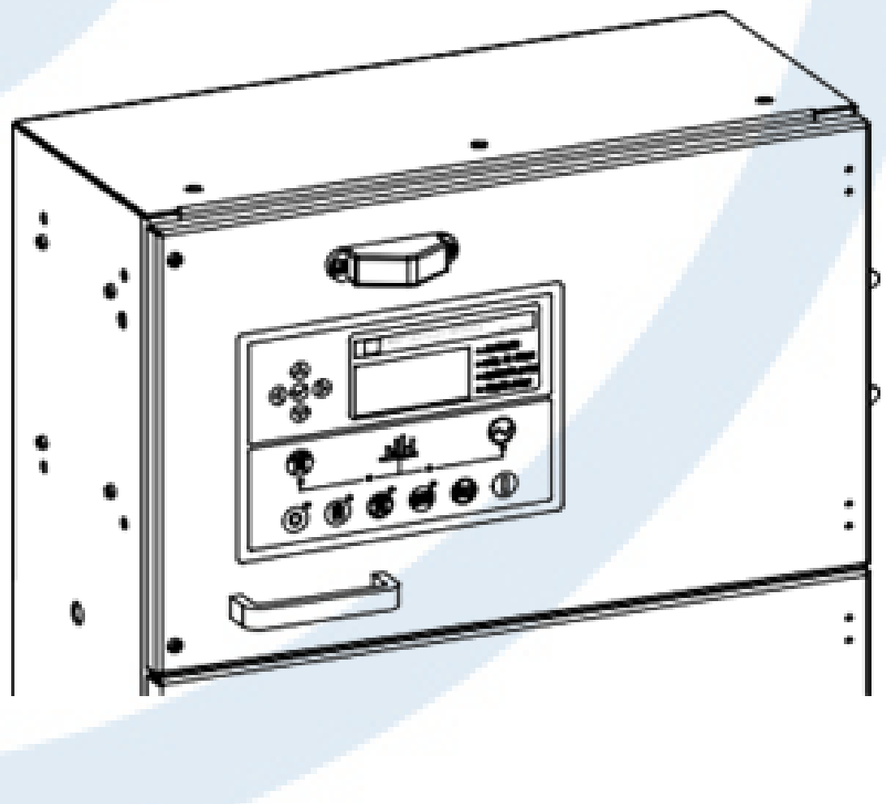


DSE-7420 Control System

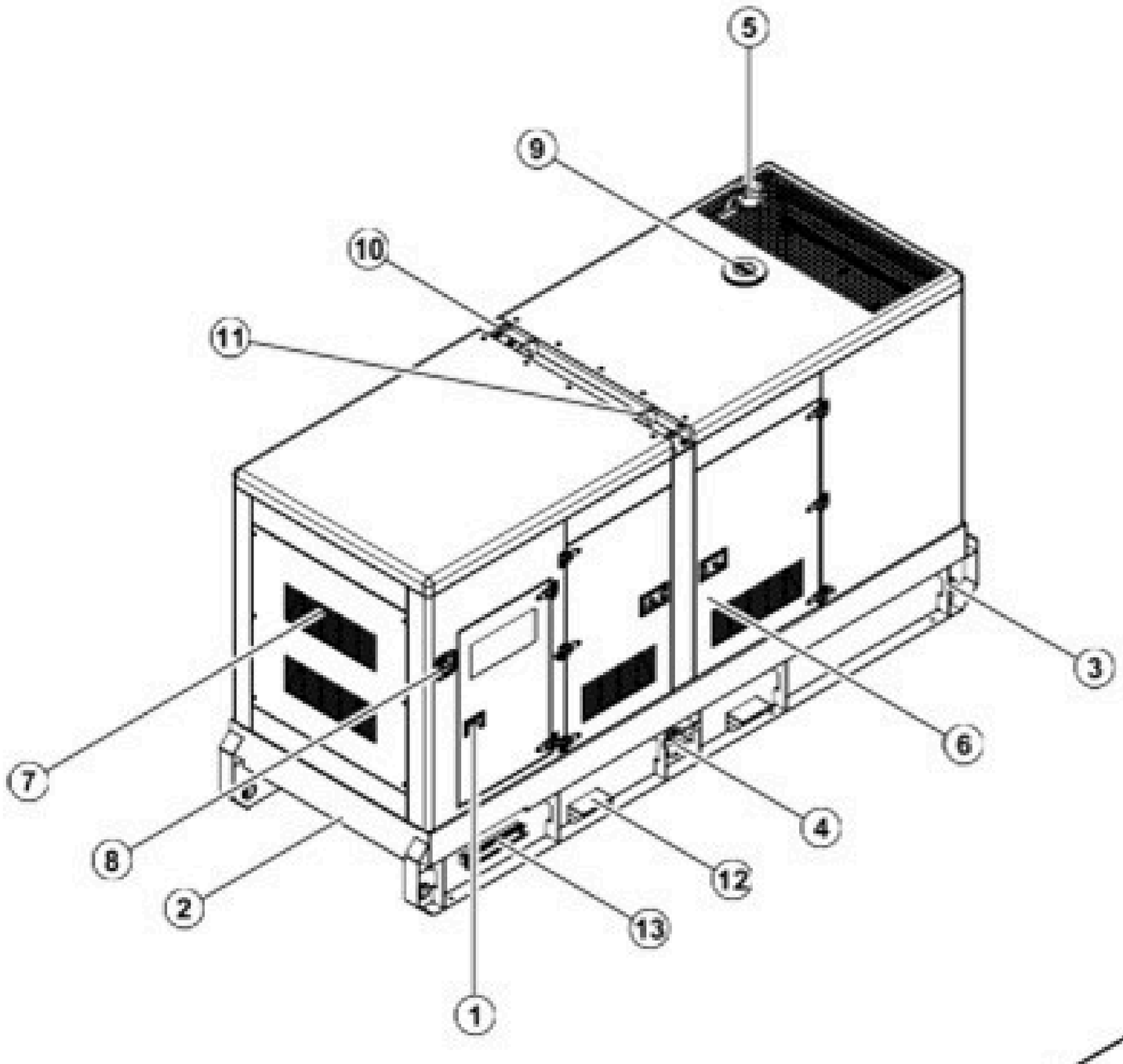
DSE-7420 is an advanced control module based on microprocessor, containing all necessary functions for protection of the genset and the breaker control. It can monitor the mains supply, and automatically start the engine when the mains is abnormal. Accurately measure various operational parameters and display all values and alarms information on the LCD. In addition, the control module can automatically shut down the engine and indicate the engine failure.

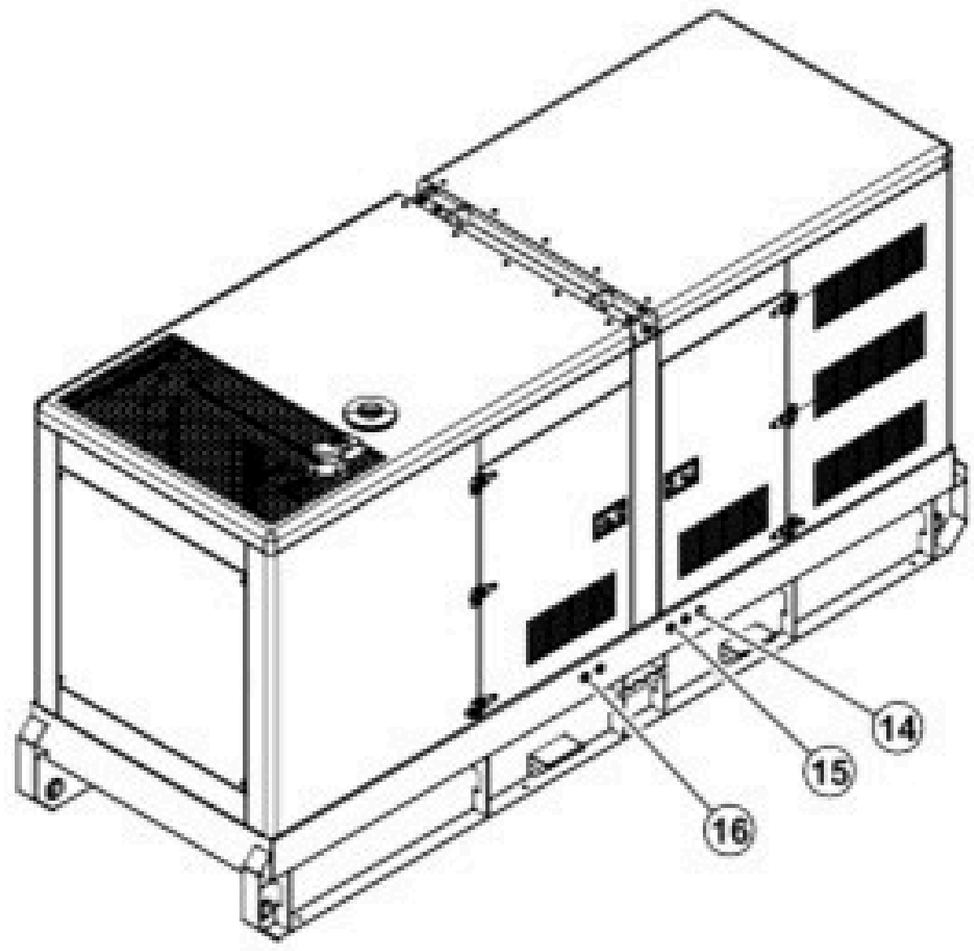
Standard Control Function

- Microprocessor control, with high stability and credibility
- Monitoring and measuring operational parameters of the mains supply and 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
- Real time clock for time and date display, overall runtime display, 250 log entries
- Overall power output display
- Integral speed/frequency detecting, telling status of start, rated operation, overspeed etc.
- Communication with PC via RS485 OR RS232 interface, using MODBUS protocol

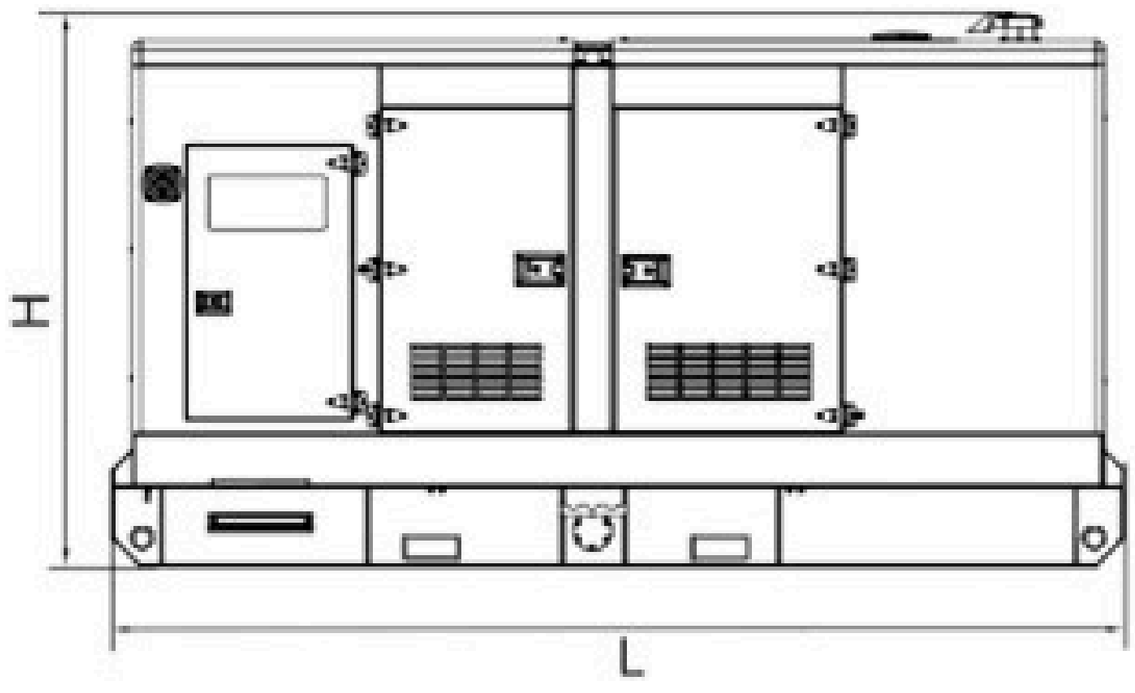


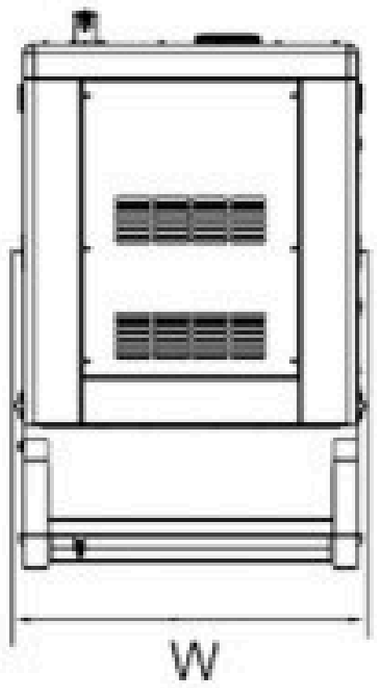
Overall Dimensions



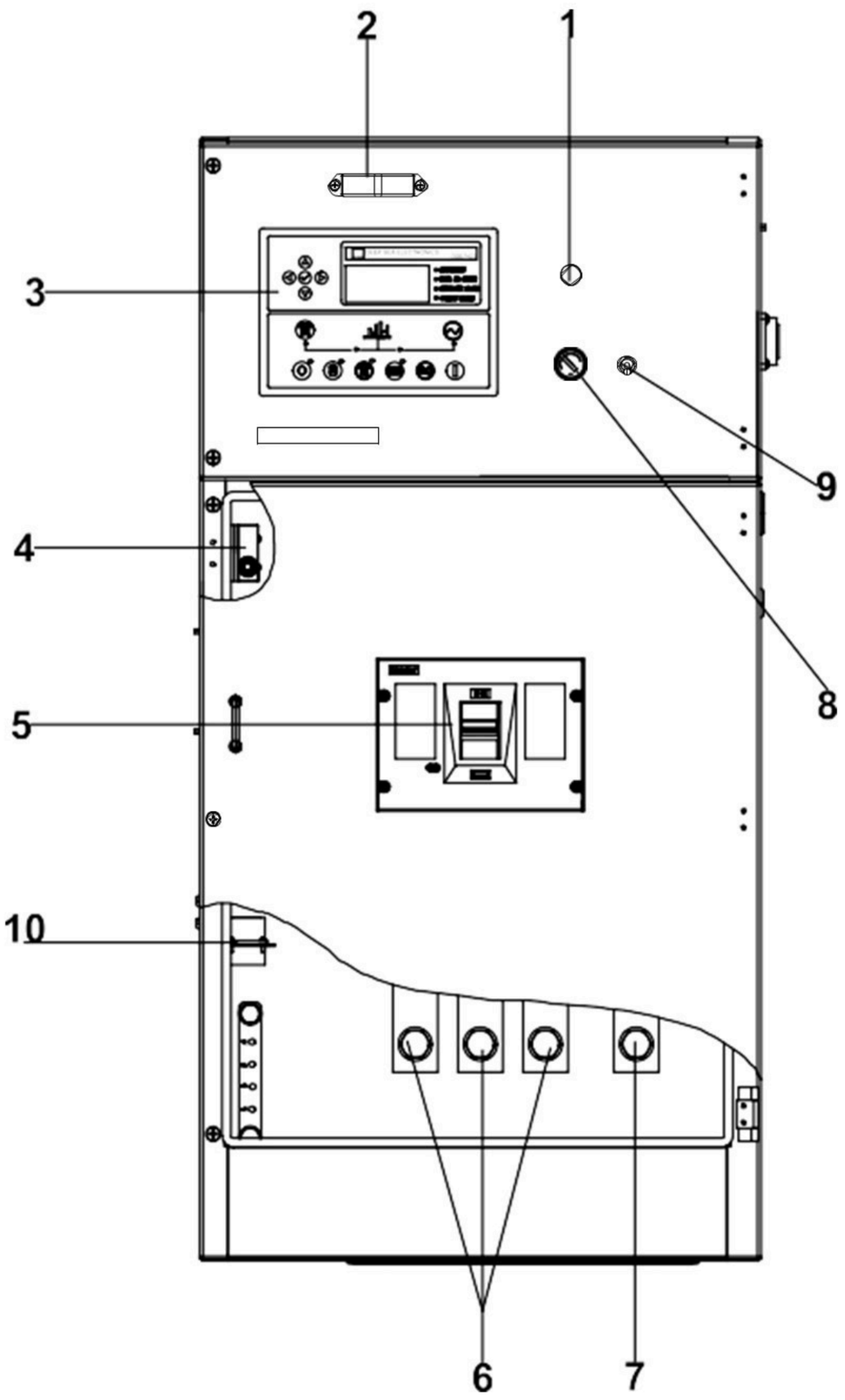


(8) Emergency stop switch
(7) Air inlet
(6) Access door
(5) Exhaust gas outlet
(4) Fuel drain
(3) Tie down
(2) Base frame
(1) Control cabinet
(16) Coolant drain hose fitting
(15) Oil drain hose fitting
(14) External fuel inlet/return hose fitting
(13) Cable trench
(12) Fork lift channel
(11) Lifting lug
(10) Roping lug
(9) Coolant inlet



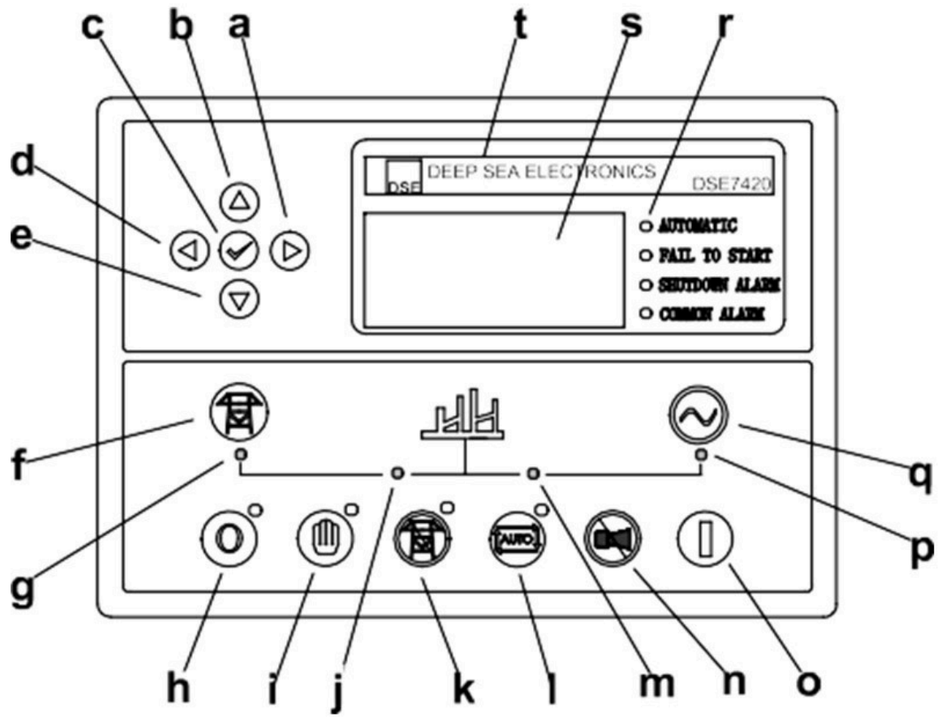


Control System



Control & field wiring cabinet

Ref.	Description
1	Charge indicator
2	Control cabinet lamp
3	Control module
4	Limit switch
5	Main circuit breaker
6	Live wire terminals
7	Neutral wire terminal
8	Key switch
9	Control cabinet lamp switch
10	ATS connector



Control module

a	Button (next page)
b	Button (increase value / previous item)
c	Button (accept)
d	Button (previous page)
e	Button (decrease value / next item)
f	Button (transfer the load to the mains supply, when in Manual mode only)
g	Mains supply available LED
h	Stop / Reset button
i	Manual button (Manual control mode)
j	Mains supply on load LED
k	Test button (Test mode)
l	Auto button (Auto mode)
m	Genset on load LED
n	Mute/Lamp test button
o	Start button (Manual)
p	Genset available LED
q	Button (transfer the load to the genset, when in Manual mode only)
r	Alarm LED (4 alarm items)
s	LCD display
t	Control module name