

40 KVA DIESEL GENERATOR

FEATURES & BENEFITS

- Maximum 44 kVA, 230V, 1500 RPM
- Constant voltage AVR (Automatic Voltage Regulator)
- 12 Volt Electric Starter
- 75 Litre Fuel Tank, 9 Hours @ 75% load
- Silent Version (± 72 dBA)
- Four cylinder, vertical, water cooled Diesel Engine, Turbocharged
- Single Phase Output
- DeepSea DSE6120 Digital Control Panel
- Low oil pressure system
- Low water cut out engine protection



PRODUCT COLOUR MAY VARY.

GENERAL DATA	
Model:	BPD40S
Prime Power (P.R.P):	40 kVA
Stand-by Power (L.T.P):	44 kVA
Amps:	191 A
Power Factor / COS:	1
Frequency:	50 Hz
Voltage:	230 V
Phases:	Single Phase
Engine Speed:	1500 RPM
Length:	2400 mm
Width:	900 mm
Height:	1150 mm
Weight:	1020 kg's
Tank Capacity:	75 l

ADDITIONAL	
Running Time:	9 Hours @ 75% load
Structure Type:	Silent
Noise Level (7m):	72 dBA
Auto Voltage Regulator:	Constant voltage AVR
ISO9001 Certified:	Yes
CE Certified:	Yes
Fuel Cons. @ 100% Load:	10.5
Fuel Cons. @ 75% Load:	8.0
Fuel Cons. @ 50% Load:	5.5

ENGINE DATA	
Brand:	FAW
Model:	4DX22-65D-HMS20W
Type:	Four cylinder, vertical, water cooled Diesel Engine, Turbocharged
Starting System:	12 Volt Electric Starter
Auto-Decompression:	Yes
Cubic Capacity (l):	3.86
Compression Ratio:	17:1
Rated Power (kW/RPM):	48 / 1500
Fuel Type:	Diesel
Lube Oil:	15W40
Low Pressure Alert:	Yes
Low Fuel Cut Out:	Yes

CONTROL PANEL	
Model:	DeepSea DSE6120
Type:	Digital Control Panel
Analogue Inputs:	2
Mains Phase Voltage:	Yes
Mains Line Voltage:	Yes

ALTERNATOR	
Model:	DPC224E1
Pole Number:	4
Excitation Mode:	Self Excitation

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4DX22-65D-HMS20W DIESEL ENGINE



ITEM	MEASURE	VALUE
Engine model		4DX22-65D-HMS20W
Type		4-cylinder 4-stroke
Air intake type		Turbocharged
Cooling mode		Water cooling
Governor mode		Electronic
Bore × Stroke	mm	102 × 118
Compression ratio		17:1
Rated speed	RPM	1500
Displacement	L	3.86
Rated power (without fan)	kW	48
Standby power (without fan)	kW	53
Emission compliant		Stage II
The flywheel shell interface		SAE3
		Flywheel for 11.5" flexible coupling
Dry weight of GenPac	kg	410
Overall Dimension	mm	1480 × 705 × 900
Fan consumption	kW	3.0
27°C air consumption	m ³ /min	3.9
Heat rejection of exhaust	kW	43.5
Exhaust gas temp. after turbine	°C	480
Exhaust gas flow	m ³ /min	10.4
Heat rejection from engine	kW	3.3
Heat rejection of coolant	kW	29
Charging Alternator		35A / 28V
Starter Motor		4.5kW / 24V

DSE6110/20 MKII

AUTO START & AUTO MAINS FAILURE CONTROL MODULES

DSE6110 MKII

DSE6120 MKII

KEY FEATURES

- Large back-lit text display
- Multiple display languages
- Heated display option available
- DSENet® expansion compatible
- Data logging facility
- Fully configurable via PC using USB communication
- Front panel configuration
- Efficient power save mode
- 3 phase generator sensing
- 3 phase mains (utility) sensing (DSE6120 MKII only)
- Generator/load power monitoring (kW, kV A, kV Ar, pf)
- Accumulated power monitoring (kW h, kVA h, kVAR h)
- Generator/load current monitoring and protection
- Generator overload protection (kW)
- Breaker control via fascia buttons
- Fuel and start outputs, configurable when using CAN
- 4 configurable DC outputs
- 4 configurable analogue/digital inputs
- Support for 0 to 10 V &

- 4 to 20 mA oil pressure sensors
- 6 configurable digital inputs
- Configurable staged loading outputs
- CAN, MPU and alternator speed sensing in one variant
- 3 engine maintenance alarms
- Engine speed protection
- Engine hours counter
- Engine pre-heat
- Engine run-time scheduler
- Engine idle control for starting & stopping
- Fuel pump control
- Real time clock
- Battery voltage monitoring
- Start on low battery voltage
- Configurable remote start input
- 1 alternative configuration
- Comprehensive warning, electrical trip or shutdown protection upon fault condition
- LCD and LED alarm indication
- Customisable information screens
- Configurable event log (100)
- Tier 4 ECO engine support including exhaust fluids & filters

- J1939-75 instrumentation output, configurable CAN instrumentation and alarms
- Start on low battery
- Enhanced alarm functionality
- Low load alarm

KEY BENEFITS

- Automatically transfers between mains (utility) and generator (DSE6120 MKII only)
- Increased input and output expansion capability via DSENet®
- User-friendly set-up and button layout for ease of use
- Multiple parameters are monitored simultaneously which are clearly displayed on a large back-lit text display via multiple languages
- The module can be configured to suit a wide range of applications
- Uses DSE Configuration Suite PC Software for simplified configuration
- Licence-free PC software
- IP65 rating (with optional gasket) offers increased resistance to water ingress

SPECIFICATIONS
DC SUPPLY

CONTINUOUS VOLTAGE RATING
8 V to 35 V Continuous

CRANKING DROPOUTS

Able to survive 0 V for 50 mS, providing supply was at least 10 V before dropout and supply recovers to 5 V. This is achieved without the need for internal batteries. LEDs and backlight will not be maintained during cranking.

MAXIMUM OPERATING CURRENT

100 mA at 12 V, 105 mA at 24 V

MAXIMUM STANDBY CURRENT

60 mA at 12 V, 55 mA at 24 V

MAXIMUM SLEEP CURRENT

40 mA at 12 V, 35 mA at 24 V

GENERATOR & MAINS (UTILITY)

VOLTAGE RANGE
15 V to 415 V AC (Ph to N)
26 V to 719 V AC (Ph to Ph)

FREQUENCY RANGE

3.5 Hz to 75 Hz

INPUTS

DIGITAL INPUTS A to F
Negative switching

ANALOGUE INPUT A

Configurable as:
Negative switching digital input
0 V to 10 V
4 mA to 20 mA
0 Ω to 240 Ω

ANALOGUE INPUTS B TO D

Configurable as:
Negative switching digital input
0 Ω to 480 Ω

OUTPUTS
OUTPUT A (FUEL)

10 A short term, 5 A continuous, at supply voltage

OUTPUT B (START)

10 A short term, 5 A continuous, at supply voltage

AUXILIARY OUTPUTS C, D, E & F

2 A DC at supply voltage

DIMENSIONS

OVERALL
216 mm x 158 mm x 43 mm
8.5" x 6.2" x 1.5"

PANEL CUT-OUT

184 mm x 137 mm
7.2" x 5.3"

MAXIMUM PANEL THICKNESS

8 mm
0.3"

STORAGE TEMPERATURE RANGE

-40 °C to +85 °C
-40 °F to +185 °F

OPERATING TEMPERATURE RANGE

NON HEATED DISPLAY VARIANT
-30 °C to +70 °C
-22 °F to +158 °F

HEATED DISPLAY VARIANT

-40 °C to +70 °C
-40 °F to +158 °F

OPTIONAL PARTS

PART	PART NUMBER
IP65 Gasket	020-521

RELATED MATERIALS
TITLE

DSE6110/20 MKII Installation Instructions
DSE6110/20 MKII Operator Manual
DSE6110/20 MKII Configuration Suite PC Manual

PART NO.

053-173
057-226
057-224

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