

TD1600



EPA Certified / Stationary Emergency

OUTPUT POWER OPTIONS					STANDBY RATING		sKVA
Make	Voltage	Alternator	Phase	Hertz	kW/kVA	Amps	30% Voltage Dip
Stamford	600	S7L1D-D4-07	3	60	1600/2000	1927	3900
	277/480	S7L1D-D4-312	3	60	1600/2000	2408	4100
Marathon	600	743RSS4290	3	60	1600/2000	1927	4900
	277/480	743RSL4052	3	60	1600/2000	2408	5700
	120/208	743RSL4052	3	60	1600/2000	2779	4675
	120/240	743RSL4052	3	60	1480/1850	2814	4675
Marathon	277/480	744RSL4054	3	60	1600/2000	2408	6600
	120/208	744RSL4054	3	60	1600/2000	2779	5800
	120/240	744RSL4054	3	60	1590/1988	3023	5800



Engine Data

Manufacturer	Mitsubishi
Model	S16R-Y2PTAW-1
Aspiration	Turbocharged
EPA Tier	2
Charge Air Cooling System	Inter-Cooler
Arrangement	V-16, 4-Cycle
Displacement: L (in. ³)	65.37 (3989.00)
Bore: mm (in.)	170.00 (6.69)
Stroke: mm (in.)	180.00 (7.09)
Compression Ratio	14.5:1
BMEP: psi (kPa)	259.0 (1785.7)
Horsepower	2279
Rated RPM	1800
Governor	Isochronous
Speed Regulation	±0.25%

Engine Liquid Capacity

Oil System: qt. (L)	243 (230)
Cooling Capacity: gal (L)	44.9 (170.0)

Engine Electrical

Electric Volts: DC	24
Cold Cranking Amps	1100
Battery(s) Required	4

Fuel System

Fuel Injection Type	Mitsubishi PS8
Max Suction Head: in. H ₂ O (kPa)	40.83 (20.16)
Recommended Fuel	Low Sulfur Diesel

Air Requirements

Air Filter(s) Type	Dry
Combustion Air Flow: CFM (m ³ /min)	5,932 (168)
Maximum Air Intake Restriction	
Clean: in. H ₂ O (kPa)	15.70 (3.91)
Dirty: in. H ₂ O (kPa)	25.00 (6.23)
Radiator Air Flow: CFM (m ³ /min)	75,008 (2124)

Exhaust System

Gas Flow: CFM (m ³ /min)	15,642 (443)
Max Back Pressure: in. H ₂ O (kPa)	23.60 (5.88)

Sound Level

Open Unit Without Exhaust: dBA 3.2 ft (1M)	112
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Filters and Quantity

Air Cleaner Quantity	4
Oil Filter(s) Quantity	2
Fuel Filter(s) Quantity	2

Fuel Consumption

At 100% of Power Rating: gal/hr (L/hr)	128.7 (487.0)
At 75% of Power Rating: gal/hr (L/hr)	94.1 (356.0)
At 50% of Power Rating: gal/hr (L/hr)	63.7 (241.0)
At 25% of Power Rating: gal/hr (L/hr)	35.1 (133.0)

Cooling System

Heat Rejection to Air Cooler: kW (BTUM)	636 (36,167)
Heat Rejection to Coolant: kW (BTUM)	636 (36,167)
Heat Rejection to Ambient: kW (BTUM)	147 (8,346)
Coolant Flow: gal/min (L/min)	489 (1850)

GENERAL GUIDELINES FOR DERATION: Altitude: Derate 0.5% per 100m (328 ft.) Elevation above 1000m (3279 ft.) Temperature: Derate 1.0% per 10°C (18°F) temperature above 25°C (77°F)

RATINGS: All three-phase units are rated at 0.8 power factor. All single-phase units are rated at 1.0 power factor.

125° RATINGS: 125° apply to installations served by a reliable utility source. The standby rating is applicable to varying loads for the duration of a power outage. There is no overload capability for this rating. Ratings are in accordance with ISO-3046/1, BS 5514, AS 2789, and DIN 6271. For limited running time and base load ratings consult the factory. The generator set manufacturer reserves the right to change the design or specifications without notice and without any obligation or liability whatsoever.

Alternator Data

Manufacturer	Stamford	
Type	PMG	
Insulation Class	NEMA H	
Temperature Rise	125°C Standby	
Hertz	60	
RPM	1800	
Amortisseur Windings	Full	
CFM Cooling Required	7300	
Voltage Regulator	MX341	MX322
Sensing	Single Phase	Three Phase
Voltage Regulation	1.0%	0.50%

Features

- BS EN 60034, BS5000, VDE 0530, NEMA MG1-32, IEC34, CSA C22.2-100, and AS1359 compliant
- IP23 enclosure
- Dynamically balanced to exceed BS6861:Part 1 Grade 2.5 vibration standard
- Quality assurance to BS EN ISO 9001
- Self-ventilated and Drip proof construction
- Two-thirds pitch stator and skewed rotor
- Heavy duty bearings
- Fully guarded
- Overexcitation protection
- Under frequency protection
- Analog input
- Overvoltage protection
- Paralleling compatible

Alternator Data

Manufacturer	Marathon	
Type	PMG	
Insulation Class	NEMA N	
Temperature Rise	125°C Standby	
Hertz	60	
RPM	1800	
Amortisseur Windings	Full	
CFM Cooling Required	3430	
Voltage Regulator	DVR2400	PM500
Sensing	Three Phase	Three Phase
Voltage Regulation	0.25%	0.25%

Features

- NEMA MG1-32, BS5000, and IEC 34-1 compliant; CE & CSA Certified and UL Listed
- Self-ventilated and drip proof construction
- Two-thirds pitch stator and skewed rotor
- Wet wound, epoxied field windings
- Designed to withstand overspeeds of up to 125%
- Hybrid analog/digital voltage regulator
- Under frequency protection
- Under frequency indication light
- Less than one cycle response time
- Over excitation protection
- Over excitation indication light
- Easy access front-panel adjustments
- Over voltage protection shutdown

Control Panels



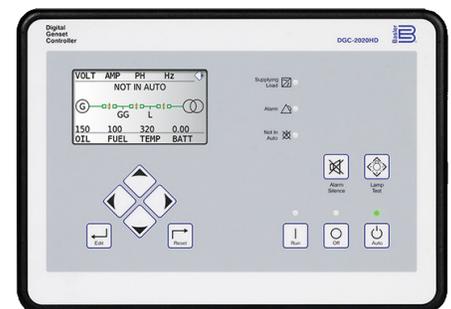
DeepSea 7310 MKII

- Simultaneous Use of RS232 & RS485
- Modbus RTU Support
- Fully Configurable Using USB, RS232 & RS485
- IP65 Rating
- 6 Programmable Inputs & 8 Outputs
- UL & cUL Listed and CE Certified



Basler DGC2020

- SAE J1939 Engine ECU Communications
- 4 Programmable Inputs & 10 Outputs
- Modbus Communications With RS485
- UL Recognized, CSA & CE Certified
- IP 54 Front Panel Rating
- NFPA 110 Level 1 Compatible
- Manual Override Keyswitch
- DGC2020HD Variant Available



Basler DGC2020HD

- SAE J1939 Engine ECU Communications
- 16 Programmable Inputs & 12 Outputs
- Load Sharing of kW and kVAR over Ethernet
- UL Recognized, CSA & CE Certified
- IP 54 Front Panel Rating
- NFPA 110 Level 1 Compatible
- Optional Color Touch Screen



Standard Features:

Warranty

2 Year Standard
5 Year Comprehensive

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|------------------------------------|------------------------|
| Heavy Duty Steel Base | Battery Charger |
| Vibration Isolators | Block Heater |
| Oil Drain Valve with Extension | Factory Powder Coating |
| Coolant Drain Kit | Factory Load Test |
| High Ambient Unit Mounted Radiator | Owner's Manual |

Controller Options

Fiber Optic Ethernet (DGC2020HD)
RS-232 Port & Generator Protection (DGC2020)
Flush or Surface Mount Remote Annunciator
Remote Mount Break Glass E-Stop Switch

Miscellaneous Options:

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|------------------------|-------------------------|
| Generator Strip Heater | Pad Type Battery Heater |
| Spring Isolators | Battery Heater Blanket |
| Line Circuit Breaker | Oil Pan Heater |

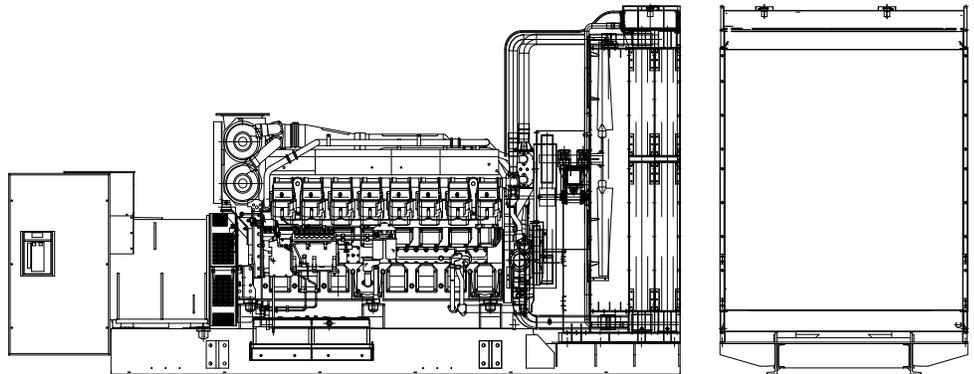
Open Unit

Options:

- Radiator Duct Flange
- Critical Silencer
- Sub-Base Fuel Tank

Overall Size: 204"L x 88"W x 105"H
 Approximate Weight: 26,800 lbs.

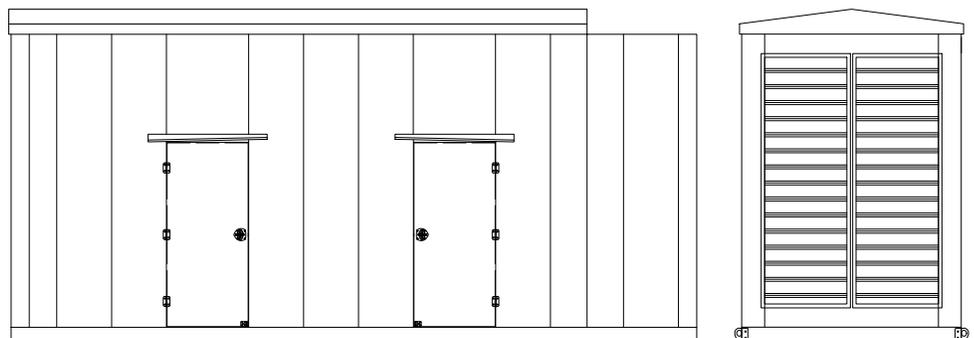
Note: Dimensions and weights reflect standard open unit with no options and are subject to change.



Standard Enclosed Unit

Options:

- Sound Attenuated Enclosure
- Load Center, Lights & GFI Receptacle
- Sub-Base Fuel Tank



Note: The above drawings are provided for reference only and should not be used for planning installation. Contact your local distributor for more information.