

# EC Series

# GMS900CS

— Generator Set Specification



**Super Quiet, Superior Life!**



# GMS900CS



3-Phase, 50Hz@1500RPM				
	Voltage	kW	kVA	Amps
<b>Prime Power</b>	380	720	900	1367.4
	400	720	900	1299.1
	415	720	900	1252.1
	440	720	900	1181.0
<b>Standby Power</b>	380	800	1000	1519.4
	400	800	1000	1443.4
	415	800	1000	1391.2
	440	800	1000	1312.2
<b>Noise Level at 7 meters (dBA)</b>				75

## Notes:

- 1) Ambient reference conditions: 1,000 mbar, 27°C, 30% relative humidity;
- 2) Standby Power: the maximum power available under varying loads. Only for standby and emergency use. No overload is permissible. Prime Power: the maximum power available under varying loads for continuous operation. A 10% overload is permissible for 1 hour every 12 hours..

Features	Benefits
<ul style="list-style-type: none"> <li>I With all the advantages of the soundproofed generators</li> <li>I Optimal unit protection with minimum size</li> <li>I Fluid containment design for greater environmental protection</li> <li>I Sound attenuated to minimize impact on local environment</li> <li>I Keeps all spillages contained inside enclosure avoiding external site</li> </ul>	<ul style="list-style-type: none"> <li>I Easy to transport</li> <li>I Easy operation</li> <li>I No need of installation</li> <li>I Suitable for outdoor use</li> </ul>

Performance Specification and Craftwork			
<b>Performance Specification</b>		<b>Telephone Interference, Electromagnetism</b>	
Efficiency of Rated Power	96.3%	TIF	≤50
Time needed from start-up to full load (inductive)	125 seconds	THF	≤2%
Time needed from start-up to 50% load (inductive) allowed	8 seconds	Radio interference in compliance with BS800 and VED LEVELS G and N.	
1.1 times overload operation time (hour)	1	<b>Craftwork</b>	
2.0 time overload operation time (minute)	1	<ul style="list-style-type: none"> <li>• Steel base frame with AV mounting</li> <li>• standard 8h fuel tank with flexible rubber fuel tube, fuel level indicator and drainage</li> <li>• Overall sprayed powder coating</li> <li>• Whole set documents, including Installation Manual, Operation Manual, Spare Parts Catalog, Circuit Diagram</li> </ul>	
Voltage Regulation, steady state	≤±1%	<b>Criterion</b>	
Voltage Regulation, transient state	20%-15%	<ul style="list-style-type: none"> <li>• ISO3046, ISO8528, BS4999, BS5514,</li> <li>• BS5000PT99、AS1359, IEC34</li> <li>• UTE5100, VDE0530</li> <li>• ISO9001:2000</li> </ul>	
Voltage Settle Time	≤5 seconds		
Voltage Fluctuation Ratio	0.5%		
Frequency Regulation, steady state	±0.5% adjustable		
Frequency Regulation, transient state	±5%		
Frequency Settle Time	5 seconds		
Frequency Fluctuation Ratio	0.5%		
Recovery Time	0.5 seconds		

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Engine Specification			Alternator Specification		
<b>Brand</b>	<b>Cummins</b>		<b>Brand</b>	<b>Stamford</b>	
<b>Model</b>	<b>KTA38G2A</b>		<b>Model</b>	<b>LVI634D</b>	
No. of Cylinders and Cycle	12V, 4 Stroke		Rated Output (kVA)	910	
Induction System	TCA		Rated current (A)	1299	
Compression Ratio	14.5: 1		Exciter	Brushless	
Displacement (L)	37.8		THF (BS EN60034- 1)	<2%	
Bore x Stroke (mm)	159 x 159		Bearing number	Single	
Net weight (kg)	3723		Windings	100% Copper	
Piston speed (m/s)	7.9		Connection Type	Star Connection	
Intake Air Flow (L/s)	1041		Insulation Class	H	
Exhaust gas temperature (°C)	527		Winding Pitch	2/3	
Exhaust gas flow (L/s)	2936		Amortisseur Winding	Full	
Base Output power (kW)	813		A.V.R. Model	MX321	
RPM	1500		Voltage Regulation (no load- full load)	± 0.5%	
Brake mean effective pressure (kPA)	4648		Underspeed Protection	Standard	
			Protection	IP23	
Fuel Consumption (L/h)	110% load		Phase Sequence	A(U), B(V), C(W)	
	100% load	191	TIF (NEMA MG 1-22)	<50	
	75% load	147	Excitation System	Self-excited, PMG optional	
	50% load	98	Ambient Temp. (°C)	40	
Governor Type	E		Stator Rated Temp. (°C)	125	

Cooling System			Fuel System		
Max. coolant friction head external to engine (kPA)	55		Type injection System	Direct injection	
Thermostat adjusting temperature (°C)	104/100		Fuel rail pressure (kPA)	22	
Min. opening pressure of radiator cap (kPA)	69				
Coolant capacity-engine only (L)	134				
Exhaust System			Lubricating System		
Max. Back Pressure (kPA)	10.1		Total system capacity (L)	135	
Electrical System			Oil pressure		
Starter (V)	24		Rated speed (kPA)	297-483	
Battery charging system (A)	35				

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## Control System

### PLC-702

DSE-702 key manual start module is a manual engine control module designed to control the engine via a key switch and 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



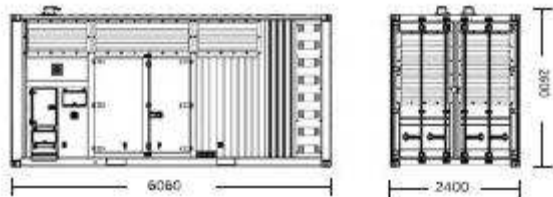
### PLC-5220

DSE-5220 control panel is applied

- | Microprocessor control, with high stability and credibility
- | Mains supply and generator operation monitoring
- | Indicating operation status and fault conditions
- | Multiple protections; multiple parameters display, like pressure, temp.
- | Manual and automatic work mode selectable
- | Real time clock for time and date display, overall runtime display, 99 log entries
- | Overall power output display
- | Integral speed/frequency detecting, telling status of start, rated operation, overspeed
- | Communication with PC via RS485 OR RS232 interface, using MODBUS protocol.



## Dimension and Weight



### GMS900CS

Length × Width × Height, mm  
6060×2400×2600

Weight (kg):  
2300+

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## Optional

Engine	Alternator	Generator Set	Fuel System	Canopy
<ul style="list-style-type: none"> <li>• Coolant heater</li> </ul>	<ul style="list-style-type: none"> <li>• Space heater</li> <li>• AVR PMG with regulator</li> <li>• Anti-damp and anti-corrosion treatment</li> <li>• Anti-condensation heater</li> </ul>	<ul style="list-style-type: none"> <li>• Tools with the machine</li> </ul>	<ul style="list-style-type: none"> <li>• Low fuel level alarm</li> <li>• Automatic fuel feeding system</li> </ul>	<ul style="list-style-type: none"> <li>• Container</li> </ul>
Lubricating System	Exhaust System	Cooling System	Control Panel	Voltages
<ul style="list-style-type: none"> <li>• Oil with the machine</li> </ul>	<ul style="list-style-type: none"> <li>• Protection board from hotness</li> <li>• Low frequency silencer</li> </ul>	<ul style="list-style-type: none"> <li>• Front heat protection</li> <li>• 50°C radiator</li> <li>• Coolant (-30°C)</li> </ul>	<ul style="list-style-type: none"> <li>• Remote control panel</li> <li>• Automatic paralleling control panel</li> <li>• Automatic Transfer Switch (ATS)</li> </ul>	<ul style="list-style-type: none"> <li>• 415/240V</li> <li>• 400/230V</li> <li>• 380/220V</li> <li>• 220/127V</li> <li>• 200-115V</li> </ul>



Local Distributor