

## IDJ200D

# IDEA DIESEL GENERATING SET TECHNICAL SPECIFICATIONS



ELECTRICAL			
FREQUENCY	VOLTAGE	PRIME	STAND-BY
50 Hz	400/230 V	180 kVA / 144 kW	200 kVA / 160 kW
60 Hz	440/255 V	210 kVA / 168 kW	235 kVA / 188 kW
Rated Speed	1500 RPM - 50 Hz / 1800 RPM - 60 Hz		
Phase	3		
Power Factor	0,8		

**Prime:** This rating is for the supply of continuous electrical power at variable load. There is no limitation on the annual hours in operation and 10% overload power can be supplied for 1 hour in 12.

**Stand-by:** This rating is for the supply of continuous electrical power at variable load, in the event of utility power failure. No overload is permitted.

WEIGHT AND DIMENSIONS			
		OPEN	CANOPY
Length	mm	2700	3500
Width	mm	1200	1200
Height	mm	1800	2010
Weight	kg	1650	2135

			50 Hz	60 Hz
Sound Pressure (LpA) - 7 mt	dB	n/a	72	74

# IDJ200D

ENGINE				
		50 Hz	60 Hz	
Output Rating	kW	155	185	
Manufacturer and Model		DHI R6113ZLD1-1		
Fuel		Diesel		
Injection		Direct		
Aspiration		Turbocharged & Aftercooled		
Cylinders		6		
Bore and Stroke	mm	113	3 x 130	
Displacement	lt	7,52		
Cooling		Water		
Engine Oil Specification		SAE 15W40		
Compression Ratio		16,2		
Engine Oil Capacity	lt		20	
Coolant Capacity (incl.radiator)	lt	70		
Governor		Med	hanical	
Air Filter		Dry e	element	
Fuel Consumption		50 Hz	60 Hz	
100 % Load	lt/h	39,8	46,4	
75 % Load	lt/h	29,0	33,8	
50 % Load	lt/h	19,1	22,3	
EXHAUST SYSTEM				
Maximum Temperature	°C	580	595	
Exhaust Gas Flow	m³/min	36,8	41,1	
Maximum Allowed Back Pressure	kPA	6,5	6,5	
Exhaust Flange Size (Internal Dia.)	mm	76		
AIR SYSTEM	37 :	42.2	14.2	
Intake Air Flow	m³/min	13,2 14,2		
Total Cooling Air Flow	m³/min	282	387	
STARTING SYSTEM				
Starter Motor	kW	6		
Battery Capacity	Ah	2 x 105		
Auxiliary Voltage	V	24		
,				
FUEL SYSTEM				
Diesel Specification		EN590		
Fuel Tank Capacity	lt	250		
ALTERNATOR				
Poles		4	4 pole	
Winding Connections		Star		
Insulation		Class H		
Enclosure		IP23		
Exciter System		Self regulating Brushless		
Voltage Regulator		AVR		
Steady State Voltage Regulation	+	±1%		
Bearing Bearing				
		Single bearing sealed		
Coupling Cooling		Flexible disc		
Cooling		Direct drive centrifugal blower fan		

The IDJ309 is a comprehensive AMF unit for single genset standby or dual genset mutual standby operations. The unit provides a comprehensive set of digitally adjustable timers, threshold levels, input and output configurations, operating sequences and engine types. All programs may be modified via front panel pushbuttons, and do not require an external unit. Last 100 faults are stored in the event log file. The event log includes not only the date-time information, but also a comprehensive list of measured genset parameters at the time that the fault has occurred.



CONTROL DANIEL FEATURES				
CONTROL PANEL FEATURES  Alarm and Shutdown functions				
High Coolant Temperature	Alarm & Shutdown			
Low Oil Pressure	Alarm & Shutdown			
Battery High / Low Voltage	Alarm			
Battery Charger Alternator Failure	Alarm			
Overspeed / Underspeed	Alarm & Shutdown			
Failure to Start	Alarm & Shutdown			
Low Coolant Level	Alarm & Shutdown			
Stop Fault	Alarm & Shutdown			
Low Fuel Level	Alarm			
Service Required	Alarm			
Generator High / Low Voltage	Alarm & Shutdown			
Generator High / Low Frequency	Alarm & Shutdown			
Symmetry between Phases	Alarm & Shutdown			
Over Current	Alarm & Shutdown			
Recitifer Fail	Alarm			
ECU failure	Alarm			
Measure and Monitor functions				
Total Run Hour	Coolant Temperature			
kW meter - Generator	Oil Pressure			
Service Indicator	Fuel Level			
Phase to Phase Voltage - Mains	Battery Voltage			
Phase to Neutral Voltage - Mains	Engine RPM			
Phase to Phase Voltage - Generator	Battery Charge Alternator Voltage			
Phase to Neutral Voltage - Gen.	Frequency - Generator & Mains			
Phase current - Generator	Power Factor - Generator			
Other functions				
Events History	Programmable Timer			
External Start Capability	Multi Lingual			
Start Restriction Program	Lamp test			
Mains Failure Start	Remote Monitoring			
Test Run Start (On load & off Load)	Manual Override			
RS 232 Serial Port	Remote Programming			

GENERATOR FEATURES	STANDARD		OPTIONAL
ENGINE	MANUAL	AUTOMATIC	
Engine		•	
Cooling Pack		•	
Tropical Radiator		X	
Heavy Duty Air Filter		X	•
Electronic Governor		X	•
High Coolant Temperature Sender		•	Х
Low Oil Pressure Sender		•	Х
Low Coolant Level Sender		•	Х
Radiator Guards		•	Х
Hot Component Guards		•	Х
Manual Oil Drain Pump		Χ	•
Fuel Prefilter		Χ	•
Water Jacket Heater	Х	•	• (Manual)
Industrial Silencer - Open Set		•	Х
Residential Silencer - Open Set		Χ	•
Residential Silencer - Canopy		•	Х
Cold start aid		Χ	•
Remote Radiator		Χ	•
Trailer		X	
ELECTRICS			
Alternator		•	Х
Circuit Breaker - 3 poles		X	
Circuit Breaker - 4 poles		X	
Battery Isolator	X		•
Earth Fault Protection		X	
Anti condensation Heater		X	
Optional Voltages		X	
Class F insulation		X	
External Stop Button - Canopy	•		Х
GSM SMS message sending on fault	X		•
Battery Charger	X •		• (Manual)
ATS Panel - 3 Poles	X •		Х
ATS Panel - 4 Poles	X	X	• (Automatic)
Synchronisation Panel	X	X Available V	• (Automatic)

• - Available X - Not Available

#### REFERENCE STANDARDS

IDEA Generating Sets are CE certified and conform to the following standards;

- Power according to ISO 3046 and ISO 8528
- EN 12100, EN 13857, EN 60204
- 2006/42/CE Machinery Safety
- 2006/95/EC Low Voltage
- 2004/108/CE EMC
- Ambient reference conditions 1000 mbar, 25 °C, 30 % relative humidity ISO8528

All the information in this leaflet is intended for general purposes only.IDEA reserves the right to change the specifications without notice.

## IDEA MAKİNA İMALAT SAN. ve TİC. LTD.ŞTİ

İstanbul Deri O.S.B Sama Cad. No:7 34957 Tuzla – Istanbul / Turkiye

Tel: +90 216 313 42 77, +90 216 313 42 78 Fax: +90 216 313 42 79

E-mail: info@ideamakina.com.tr