



INDUSTRIAL RANGE

1 MAIN FEATURES

T Triphasic
 Diesel fuel
 Volvo / TAD734GE
 Leroy somer / TAL046D
 / 7320

Hz 50Hz
 1500 r.p.m.
V 400V
cos φ 0,8

Standby power (STP)	275 kVA	220 kW
Prime Power (PRP)	250 kVA	200 kW
Power Continuous (COP)	- kVA	- kW

Hz 60Hz
 1800 r.p.m.
V 480V
cos φ 0,8

Standby power (STP)	282 kVA	226 kW
Prime Power (PRP)	256 kVA	205 kW
Power Continuous (COP)	- kVA	- kW

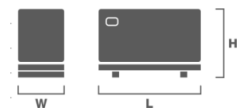
OPEN SKID

Length (L)	3800 mm
Height (H)	1920 mm
Width (W)	1250 mm
Weight	2093 kg
Daily tank	550 L



SOUNDPROOF

Length (L)	3800 mm
Height (H)	1920 mm
Width (W)	1250 mm
Weight	2878 kg
Daily tank	550 L



	50Hz	60Hz
Acoustic pressure level @ 1m	-	-
Acoustic pressure level @ 7m	-	-

	50Hz	60Hz
Acoustic pressure level @ 1m	78 dB(A)	80 dB(A)
Acoustic pressure level @ 7m	65 dB(A)	67 dB(A)

AVAILABLE VOLTAGES - 50Hz

FP (cos φ)	Phase	Voltage	COP (kVA/kW)	PRP (kVA/kW)	STP (kVA/kW)	Circuit breaker (A)
0,8	Three-phase	440	- / -	238 / 190	262 / 209	400
1	Three-phase	440	- / -	190 / 190	209 / 209	250
0,8	Three-phase	415	- / -	250 / 200	275 / 220	400
1	Three-phase	415	- / -	200 / 200	220 / 220	400
0,8	Three-phase	400	- / -	250 / 200	275 / 220	400
1	Three-phase	400	- / -	200 / 200	220 / 220	400
0,8	Three-phase	380	- / -	244 / 195	264 / 211	400
1	Three-phase	380	- / -	203 / 203	223 / 223	400
0,8	Three-phase	240	- / -	250 / 200	275 / 220	630
1	Three-phase	240	- / -	200 / 200	220 / 220	630
0,8	Three-phase	230	- / -	250 / 200	274 / 219	630
1	Three-phase	230	- / -	200 / 200	220 / 220	630
0,8	Three-phase	220	- / -	238 / 190	262 / 209	630
1	Three-phase	220	- / -	190 / 190	209 / 209	630
0,8	Single phase	230	- / -	150 / 120	165 / 132	800
1	Single phase	230	- / -	120 / 120	132 / 132	630

AVAILABLE VOLTAGES - 60Hz

FP (cos φ)	Phase	Voltage	COP (kVA/kW)	PRP (kVA/kW)	STP (kVA/kW)	Circuit breaker (A)
0,8	Three-phase	480	- / -	256 / 205	282 / 226	400
1	Three-phase	480	- / -	211 / 211	233 / 233	400
0,8	Three-phase	440	- / -	255 / 204	282 / 225	400
1	Three-phase	440	- / -	210 / 210	232 / 232	400
0,8	Three-phase	416	- / -	255 / 204	281 / 225	400
1	Three-phase	416	- / -	210 / 210	232 / 232	400
0,8	Three-phase	380	- / -	245 / 196	270 / 216	400
1	Three-phase	380	- / -	196 / 196	216 / 216	400
0,8	Three-phase	240	- / -	256 / 205	282 / 226	630
1	Three-phase	240	- / -	211 / 211	233 / 233	630
0,8	Three-phase	220	- / -	255 / 204	282 / 225	800
1	Three-phase	220	- / -	210 / 210	232 / 232	630
0,8	Three-phase	208	- / -	255 / 204	281 / 225	800
1	Three-phase	208	- / -	210 / 210	232 / 232	630
0,8	Single phase	240	- / -	165 / 132	182 / 145	800
1	Single phase	240	- / -	132 / 132	145 / 145	630


2 ROOM INSTALLATION

EXHAUST SYSTEM	50 Hz			60 Hz		
	COP	PRP	STP	COP	PRP	STP
Exhaust gas temperature (°C)	-	495	550	-	475	510
Exhaust gas flow (m³/min)	-	33	33,4	-	36,7	37,9
Evacuated Heat (kW)	-	160	177	-	174	189
Maximum back pressure (kPa)	10					
Exhaust silencer attenuation (dB)	30					
Output Diameter (mm)	114					

VENTILATION SYSTEMS	50 Hz			60 Hz		
	COP	PRP	STP	COP	PRP	STP
Combustion air flow (m³/min)	-	16,1	16,3	-	18,3	18,9
Cooling airflow (m³/min)	234,4			285,4		
Maximum load losses (Pa)	170					
RADIATION	50 Hz			60 Hz		
	COP	PRP	STP	COP	PRP	STP
Engine (kW)	24	24	26	25	25	28
Alternator (kW)	14,6	14,6	17,2	20,4	20,4	23,6
Alternator (kW)	11,4	11,4	13,1	13,9	13,9	15,9

3 ENGINE SPECIFICATIONS


GENERAL SPECIFICATIONS	50 Hz	60 Hz
Model	TAD734GE	
Emissions	FASE II	
Performance grade	G3	
Operating method	Four stroke	
Fuel type	Diesel fuel	
Refrigeration system	Water/antifreeze Closed Circuit	
Aspiration system	Turbocharged	
Injection system	Direct	
No. and Cylinder arrangement	6 In-Line	
Displacement (L)	7,15	
Cylinder bore (mm)	108	
Cylinder stroke (mm)	130	
Compression Ratio	17:1	
Regulation	Electronic	
Rotation speed	1500	1800
Piston Speed (m/s)	6,5	7,8
Gross power COP (kWm)	-	-
Gross power PRP (kWm)	228	239
Gross power STP (kWm)	250	263
Fan power (kWm)	9	16
Net Power COP (kWm)	-	-
Net Power PRP (kWm)	219	223
Net Power STP (kWm)	241	247
BMEP COP (kPa)	-	-
BMEP PRP (kPa)	2500	2200
BMEP STP (kPa)	2800	2400



CONSUMPTION		50Hz		60Hz	
Fuel consumption	LOAD	lt/h	g/kWh	lt/h	g/kWh
STP	100%	60,3	205	64	207
	75%	54,5	204	57,6	205
	50%	43,5	217	46,8	222
PRP	100%	31,1	233	33,3	237
	75%	-	-	-	-
	50%	-	-	-	-
COP	75%	-	-	-	-
	50%	-	-	-	-
Oil consumption	< 0,05% of fuel consumption				
REFERENCE CONDITIONS					
Temperature (°C)	25				
Atmospheric pressure (kPa)	100				
CAPACITY					
Coolant (L)	32				
Oil (L)	29				
STARTING SYSTEM					
Voltage (V)	24				
Power (kW)	5				
Battery (Ah)	155				

4 ALTERNATOR SPECIFICATIONS

GENERAL SPECIFICATIONS	
Model	TAL046D
Phases No.	Triphasic
Protection	IP23
Insulation	H
Temperature Rise	H
50Hz R.F.I. telephone interference	THF<2%
60Hz R.F.I. telephone interference	TIF<50
R.F.I. Suppression	CEM 2014/30/UE
Coupling	Semi-Flexible



Wave form distortion with no load	< 3,5%
Wave form distortion with balanced linear load	< 5%
Winding Leads	6
Excitation (standard / option)	SHUNT / AREP
AVR Model (standard / option)	R150 / R180



INDUSTRIAL RANGE

RATED POWER - 50Hz								RATED POWER - 60Hz							
FP (cos Ø)	Phase	Voltage (V)	Power		Efficiency			FP (cos Ø)	Phase	Voltage (V)	Power		Efficiency		
			PRP/STP (kVA)	PRP/STP (%)	PRP/STP (%)	Xd	X'd				X''d	PRP/STP (kVA)	PRP/STP (%)	PRP/STP (%)	Xd
0,8	Three-phase	440	238 / 262	91,8 / 91,5	2,910	0,146	0,117	0,8	Three-phase	480	313 / 344	91,8 / 91,4	3,860	0,194	0,155
1	Three-phase	440	190 / 209	94,6 / 94,5	2,910	0,146	0,117	1	Three-phase	480	250 / 275	94,4 / 94,2	3,860	0,194	0,155
0,8	Three-phase	415	250 / 275	91,6 / 91,1	3,440	0,173	0,138	0,8	Three-phase	440	280 / 308	91,6 / 91,2	4,110	0,207	0,165
1	Three-phase	415	200 / 220	94,5 / 94,2	3,440	0,173	0,138	1	Three-phase	440	224 / 246	94,3 / 94,0	4,110	0,207	0,165
0,8	Three-phase	400	250 / 275	92,7 / 92,2	3,700	0,186	0,149	0,8	Three-phase	416	265 / 292	91,4 / 90,9	4,350	0,219	0,175
1	Three-phase	400	200 / 220	94,3 / 94,0	3,700	0,186	0,149	1	Three-phase	416	212 / 233	94,0 / 93,8	4,350	0,219	0,175
0,8	Three-phase	380	340 / 264	89,0 / 90,9	5,580	0,281	0,225	0,8	Three-phase	380	245 / 270	90,8 / 90,3	4,820	0,243	0,194
1	Three-phase	380	272 / 299	92,8 / 92,3	5,580	0,281	0,225	1	Three-phase	380	196 / 216	93,6 / 93,3	4,820	0,243	0,194
0,8	Three-phase	240	250 / 275	91,6 / 91,1	3,440	0,173	0,138	0,8	Three-phase	240	313 / 344	91,8 / 91,4	3,860	0,194	0,155
1	Three-phase	240	200 / 220	94,5 / 94,2	3,440	0,173	0,138	1	Three-phase	240	250 / 275	94,4 / 94,2	3,860	0,194	0,155
0,8	Three-phase	230	250 / 275	91,4 / 90,9	3,700	0,186	0,149	0,8	Three-phase	220	280 / 308	91,6 / 91,2	4,110	0,207	0,165
1	Three-phase	230	200 / 220	94,3 / 94,0	3,700	0,186	0,149	1	Three-phase	220	224 / 246	94,3 / 94,0	4,110	0,207	0,165
0,8	Three-phase	220	238 / 262	91,8 / 91,5	2,910	0,146	0,117	0,8	Three-phase	208	265 / 292	91,4 / 90,9	4,350	0,219	0,175
1	Three-phase	220	190 / 209	94,6 / 94,5	2,910	0,146	0,117	1	Three-phase	208	212 / 233	94,0 / 93,8	4,350	0,219	0,175
0,8	Single phase	230	150 / 165	87,2 / 86,4	6,720	0,338	0,271	0,8	Single phase	240	165 / 182	86,5 / 85,6	8,140	0,410	0,328
1	Single phase	230	120 / 132	91,3 / 90,8	6,720	0,338	0,271	1	Single phase	240	132 / 145	90,5 / 90,0	8,140	0,410	0,328

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CONTROL PANEL



GENSET	DEEPSEA 7320	OPTIONAL
Voltage (Ph-Ph / Ph-N)	• / •	• / •
Current intensity	•	•
Frequency	•	•
RMS values	•	•
Generator phase sequence	•	•
Generator earth current [a]	o	o
No. of registers events	250	250
Real time clock	•	•
PIN protection	•	•
kWh, kVAh, kVAh, kVAh, cos Ø	•	•
Synchroscope (m)	-	o
Nº of available outputs [b]	6	6
Engine run hours	•	•
Indication of alarms on LCD	•	•
Total no. of LED indicators	12	12
No. of LED alarms	4	4
Sound signalling alarms	•	•
Scheduler	•	•
Fuel Level	•	•

Electrical network	DEEPSEA 7320	OPTIONAL
Voltage (Ph-Ph / Ph-N)	• / •	• / •
Current intensity [a]	-	o
Frequency	•	•
kVA, kW, cos Ø (a)	-	o
Inversion control between main-group	•	•
Protections and Alarms	DEEPSEA 7320	OPTIONAL
High / low battery voltage	A	o
Failure in Battery Charge Alternator	A	o
Failure to stop	A/S	A/S
Failure to start	A/S	A/S
Low fuel level	A/S	A/S
Overload	A/S	A/S
Earth leakage	A/S	A/S
Asymmetry between phases	A/S	A/S
Maintenance	A/S	A/S
High / Low generator frequency	A/S	A/S
Engine overspeed	A/S	A/S
Engine underspeed	A/S	A/S
Generator overvoltage	A/S	A/S
Generator undervoltage	A/S	A/S
ECU Alert (if applicable)	A/S	A/S
Low oil pressure	A/S	A/S
Low level of radiator water [f]	A/S	A/S
Engine high temperature	A/S	A/S
Fuel leakage/ theft	A	o

6 CONTROL PANEL

Engine	DEEPSEA 7320	OPTIONAL
Engine Speed	•	•
Low oil pressure protection	•	•
Oil pressure reading [c]	o	o
High temperature engine protection	•	•
Engine temperature reading [c]	o	o
Engine battery voltage	•	•
Intensity of the engine battery [d]	o	o
Fuel Consumption [e]	•	•
Low level of radiator water [f]	o	o
Engine maintenance scheduled	•	•
Communication	DEEPSEA 7320	OPTIONAL
USB female type B plug (Max. 6m) [g]	•	•
USB female type A plug (n)	-	o
RS232 port (Max. 15m) (n)	•	•
RS485 port (Max. 1,2Km) [h]	•	•
Ethernet port RJ45 [i]	o	o
GSM and/or GPS [j]	o	o
ModBus RTU protocol [h]	•	•
ModBus TCP protocol [i]	o	o
SNMP protocol [l]	o	o
CAN port (Max. 40m)	•	•
MSC port (Max. 240m) (m)	-	o
PLC functionality	•	•

Applications	DEEPSEA 7320	OPTIONAL
Automatic or manual starting	•	•
Remote start by NO dry contact	•	•
Automatic by mains failure	•	•
Alternating with timesharing	-	o
Multi-generators synchronization and load sharing (Max. 32 generators) (m)	-	o
Generator-Main in synchronism and load sharing (1 generator and 1 main) (m)	-	o
Optional expansions	DEEPSEA 7320	OPTIONAL
DSE2130 (8 inputs dig.) IG-IOM (8 in/outputs dig. + 4 inputs anal.) G-08 (8 inputs dig.)	•	•
DSE2157 I-RB8 G-06 (8 relay outputs)	•	•
DSE890 IL-NT-GPRS G-GSM (GSM and/or GPS)	•	•
DSE891 IB-LITE G-ETH (ethernet module)	•	•
DSE892 IB-LITE - (ethernet module according SNMP protocol)	•	•
DSE2548 IGL-RA15 - (expansion with 8 additional LEDs)	•	•
DSE2510 / 20 (mirror controller, maximum distance 1km)	•	•
Standards		
Working temperature		-30 -> 70°C
Protection index (when assembled with sealing gasket)		IP65
Degree of humidity (during 48hr)		93% / 40°C

Legend

•	Available
o	Optional
-	Not available
A	Warning Alarm
S	Stop alarm
[a]	Need additional CT
[b]	No. of outputs available for standard configuration. The outputs do not include relays and additional terminal connections.
[c]	If the information is not provided by the engine-ECU, you need an additional sensor

[d]	Needs additional ammeter
[e]	If information provided by the engine ECU
[f]	Required additional sensor
[g]	Requires the addition of the IL-NT-S-USB module
[h]	Requires the addition of the IL-NT-RS232-485 module
[i]	DeepSea: Requires the addition of the DSE891 module/ ComAp: Requires the addition of the IB-LITE module
[j]	DeepSea: Requires the addition of the DSE890 module/ ComAp: Requires the addition of the IL-NT-GPRS module
[l]	DeepSea: Requires the addition of the DSE892 module/ ComAp: Requires the addition of the IB-LITE module

Indicative weights and dimensions. Reference ambient conditions: 100kPa, 25°C, 30% relative humidity and fuel temperature below 40°C. Power in accordance with ISO 8528: Continuous power (PRP): Maximum available power to feed a variable electrical load for an unlimited period. The average of load factor in 24h of operation, shall not exceed 70% of the PRP. Admits 10% of overload during the maximum period of 1h every 12h of operation. The operation under overload shall not exceed 25h/year. Emergency Power (STP): Maximum available power to feed variable electrical load for a maximum period of 200h/year. The average of load factor in 24h of operation shall not exceed 70% of the STP. No overload. These specifications are subject to change without notice.

Distribuidor