# ENERGIN® M06 GEN H122





The ENERGIN® GEN generator set produces electricity either parallel with the public network or with an isolated load. As an option, automatic emergency operation and/or island-parallel operation with other generators is possible.

The unit is supplied as a compact, fully functional unit, with or without a sound attenuating enclosure. The engine, generator, and the control and power panel are mounted, ready for operation on the vibration-decoupled base frame. A lubrication oil system, which allows operation of up to 2000 hours without manual lube oil refilling, is integrated on the unit.

The electrical control system provides protection and control functions for automatic or manual operation. A 12" touch panel informs about operating conditions and allows the operation and parameterization of the system. Various interfaces are available for communication with other power generators and an overhead control system. An Ethernet interface allows connection to the Internet for remote monitoring and remote maintenance.

The entire system is certified according to the BDEW medium voltage directive (Grid code).

#### **TECHNICAL DATA**

Manufacturer		R Schmitt Enertec
ENERGIN® Type		M06 GEN H122
Electrical power <sup>1</sup>	kW	122
Gas consumption <sup>2</sup> (LHV)	kW	362
Self consumption <sup>3</sup>	kW	5,6

#### **DESIGN**

Fuel type		Wood Gas
Lower heating value LHV	kWh/Nm³	1,4
Gas flow pressure <sup>4</sup>	kPa	3,5 - 5,0
Inlet air temperature	°C	20
Exhaust temperature	°C	496

#### **EXHAUST EMISSIONS<sup>5</sup> WITHOUT CATALYST**

NO <sub>x</sub>	mg/Nm³	250
CO	mg/Nm³	3000
Formaldehyde	mg/Nm³	100

### ENGINE

Manufacturer		R Schmitt Enertec
ENERGIN® Type		M06-HT2D41
Working principle		4-stroke
Cylinder configuration		6 in V / 90°
Valves per cylinder		4
Aspiration		turbocharged
Mixture cooling		2-staged
Displacement	ltr	11,3
ILIRE OII		

# Consumption

Lube oil volume

ALTERNATOR		
Manufacturer		Leroy Somer
Туре		LSA 46.3 S4
Voltage	V / Hz	400 / 50
Speed	1/min	1.500
Efficiency	%	95 1

ltr

Itr/OH

255 0,03



### PERFORMANCE<sup>6</sup>

Load		100 %	75 %	50 %
Electrical power	kW	122	92	61
Fuel consumption	kW	362	277	199
Gas flow at LHV	Nm³/h	252	193	138
Electrical efficiency	%	33,7	33,2	30,7
Exhaust gas flow <sup>7</sup>	m³/h	1.828	1.414	1.020
Air requirement	m³/h	4.254	3.570	3.043
Exhaust air <sup>8</sup>	m³/h	3.699	3.161	2.761

## DIMENSIONS AND WEIGHTS WITH SOUND ENCLOSURE

Length	mm	3.200
Height	mm	2.000
Height with 90° elbow	mm	2.990
Width	mm	1.440
Dry weight	kg	3.050
Operational weight	kg	3.310

#### CONNECTIONS

Exhaust	DN / PN	150 / 10
Fuel gas	DN / PN	80 / 16
Cooling water LT	DN / PN	40 / 16
Cooling water HT	DN / PN	50 / 16

<sup>&</sup>lt;sup>1</sup> +0 % tolerance on electrical power output

<sup>&</sup>lt;sup>2</sup> +5 % tolerance on fuel consumption

<sup>&</sup>lt;sup>3</sup> average self consumption with emergency cooling

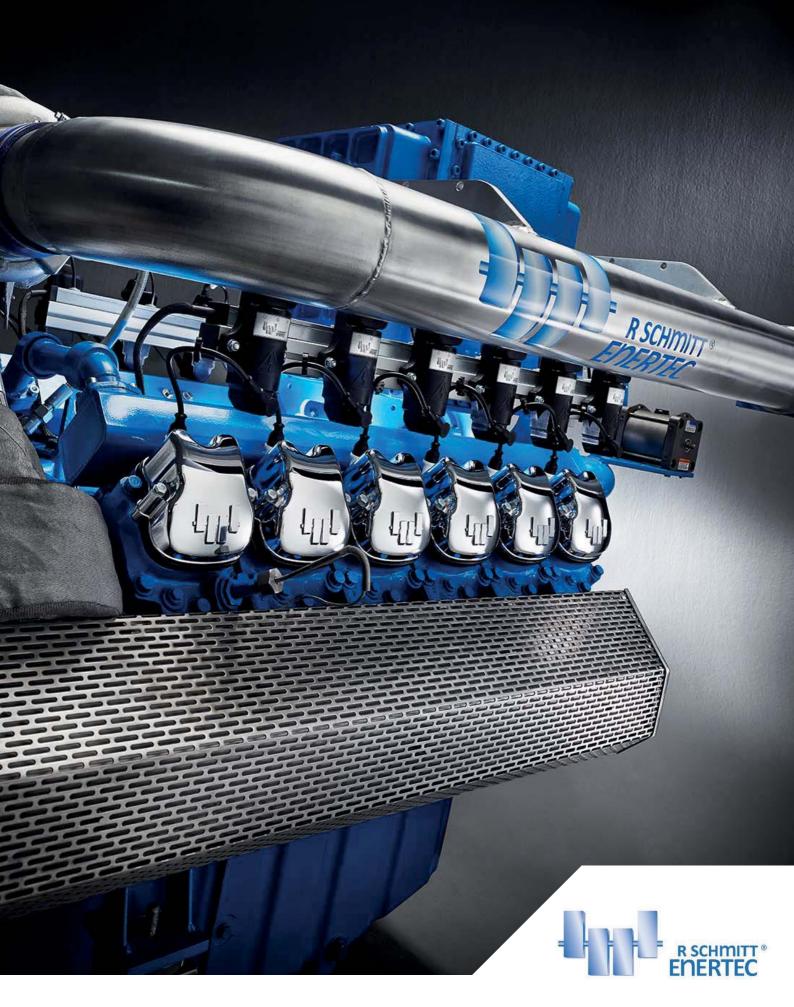
<sup>4</sup> maximum variation of 10 % for set value

<sup>&</sup>lt;sup>5</sup> Exhaust emissions related to 5 % oxygen in dry exhaust

<sup>&</sup>lt;sup>6</sup> at standard conditions according to ISO 3046-1;  $\cos \varphi = 1$ 

<sup>&</sup>lt;sup>7</sup> wet exhaust gas at 496 °C

<sup>&</sup>lt;sup>8</sup> ΔT = 15 K



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