



Specifications **Natural gas CHP** **FMB-285-GSMK**

Issue: 07.2010_002 data sheet

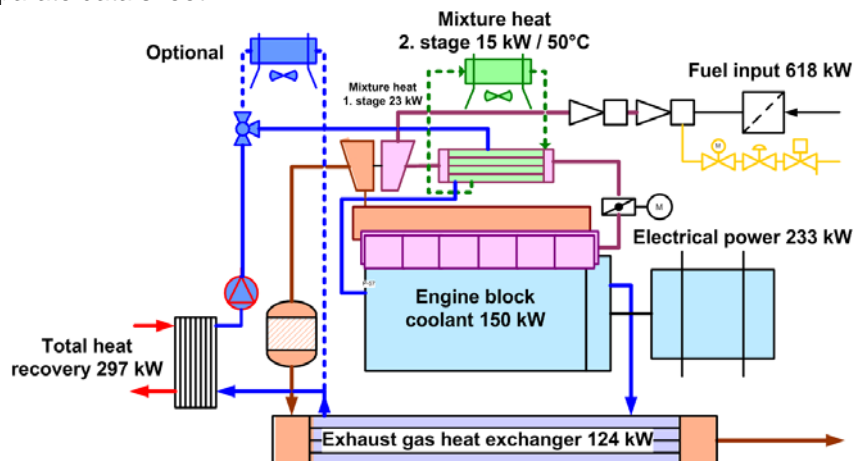
Engine specifications

Manufacturer	SCHMITT ENERTEC		
Type	SE-MB-1508-GTA50		
Speed	min ⁻¹	1500	
Displacement	Liter	15,08	
Number of cylinders	8 / V		
Aspiration	Lean burn engine turbo charged and 2-stage mixture cooling		
Generator: 400V~ / 50Hz / synchronous / 315SB4	Time constants: [s] T`do=1,42 / T`d=0,14		
Reactances: [%] x _d =345 / x _q =175 / x`d=30 / x`d=14,0 / x`q=16,4 / x ₂ = 15,2 / x ₀ = 3,8			

Performance data		100 %	75 %	50 %
Electrical power) ¹	kW	233	175	117
Total heat recovery) ²	+/- 8% kW	297	240	175
-Exhaust gas heat	+/- 8% kW	124	98	71
-Coolant water	+/- 8% kW	150	124	95
-Mixture heat	+/- 8% kW	23	18	9
Fuel input	+/- 5% kW	618	483	340
Consumption natural gas (Hu 10,02 kWh / Nm ³)	+/- 5% Nm ³ / h	61,7	48,2	33,9
Electrical efficiency	%	37,7	36,2	34,4
Thermal efficiency	%	48,1	49,6	51,3
Total efficiency	%	85,5	85,8	85,6
CHP coefficient		0,78		

System parameters

Flow temperature	max. °C	90
Return temperature	max. °C	70
Gas connection	RP	2"
Heating water connection	DN / PN	2x 65 / 16
Exhaust gas connection	DN / PN	150 / 6
Mixture cooling connection	DN / PN	2x 40 / 16
Air requirement combustion + ventilation	Nm ³ / h	8.550
Noise level with housing	1m distance	70 dB(A)
Main dimensions	L x W x H [m]	3,6 x 1,45 x 2,45
Weight (approx.)	kg	3.600
Gas composition	separate data sheet	



)¹ at 50 Hz, U=0,4 KV, pf =1)² at exhaust gas temperature 120°
 NOx < 500 mg/Nm³ (Engine adjustment for 250 mg/Nm³ possible with deviating efficiency), CO < 300 mg/Nm³
 Reference conditions: Combustion air / ambient temperature >+5°C / <+27 °C; Altitude at site <300 m