



Industrial gas turbine

The SGT-300 industrial gas turbine has a rugged industrial design that enables high efficiency, reliability, and excellent emissions performance in a broad spectrum of applications for both power generation and mechanical drive.

The gas turbine is a proven unit for all electrical power generation and cogeneration applications.

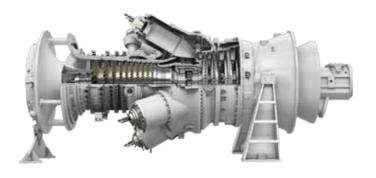
It operates on a wide range of gaseous and liquid fuels. The compact arrangement, on-site or off-site maintainability, and inherent reliability of the SGT-300 make it an ideal gas turbine for the demanding oil and gas industry.

References

Over 140 units have been sold, with more than 4.5 million equivalent operating hours.



The SGT-300 twin-shaft version is used for mechanical drive





Twin-shaft design – evolutionary design focused on reliability

SGT-300 gas turbine package design

	Simple cycle power generation	Mechanical drive applications	
Power output	7.9 MW(e)	8.2 MW	
Fuel	Natural gas, liquid fuel, dual fuel; other fuels on request; automatic changeover from primary to secondary fuel at any load		
Frequency	50/60 Hz		
Gross efficiency	30.6%	34.6%	
Heat rate	11,773 kJ/kWh	10,400 kJ/kWh	
Turbine speed	14,010 rpm	11,500 rpm	
Pressure ratio	13.7:1	13.3:1	
Exhaust gas flow	30.2 kg/s	29.0 kg/s	
Exhaust temperature	542 °C (1,008 °F)	498°C (924°F)	
NO _x emissions	\leq 15 ppmvd at 15% O $_2$ on fuel gas (with DLE)	≤15 ppmvd at 15% O ₂ on fuel gas (with DLE)	

	Physical dimensions		
	Power generation package	Mechanical drive package	
Approx. weight	59,000 kg (130,073 lb)	32,000 kg (70,548 lb)	
Length	11.8 m (38.55 ft)	6.9 m (22.64 ft)	
Width	2.9 m (9.35 ft)	2.9 m (9.35 ft)	
Height	3.5 m (11.48 ft)	3.9 m (12.76 ft)	

Note: Dimensions exclude inlet filter housing and exhaust stack.

Power generation: 7.9 MW(e) Mechanical drive: 8.2 MW

■ Low maintenance requirements

■ Single-shaft version for power generation, twin-shaft version for mechancial drive applications

■ Low emissions