Cummins Inc.	Basic Engine Model: KTA50-G9	Curve Number: FR-6244 (1P / 2L) FR-6295 (2P / 2L)	Page No.
Columbus, Indiana 47201	Engine Critical Parts List: CPL: 2527 (1 Pump / 2 Loop) CPL: 2533 (2 Pump / 2 Loop)	Date: 26Nov01	
ENGINE PERFORMANCE CURVE			

Displacement : **50.3** litre (**3067** in^3)	Bore : **159** mm (**6.25** in.) Stroke : **159** mm (**6.25** in.)
No. of Cylinders : **16**	Aspiration : **Turbocharged and Low Temperature Aftercooled**

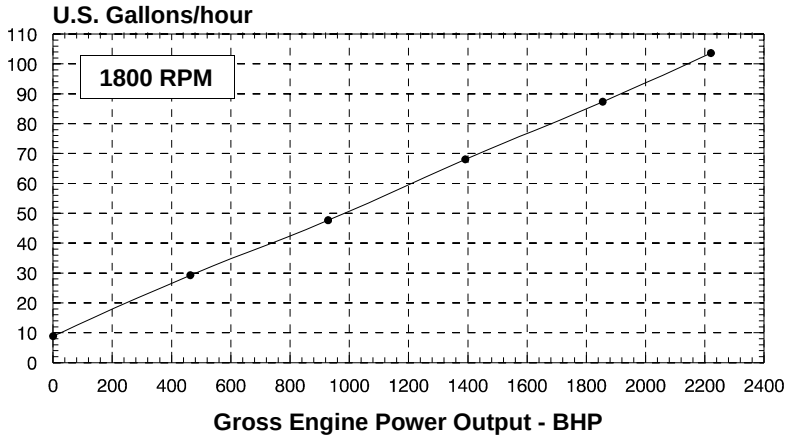
Engine Speed	Standby Power		Prime Power		Continuous Power	
RPM	kWm	BHP	kWm	BHP	kWm	BHP
1800	1656	2220	1384	1855	1224	1640

Emissions Certification

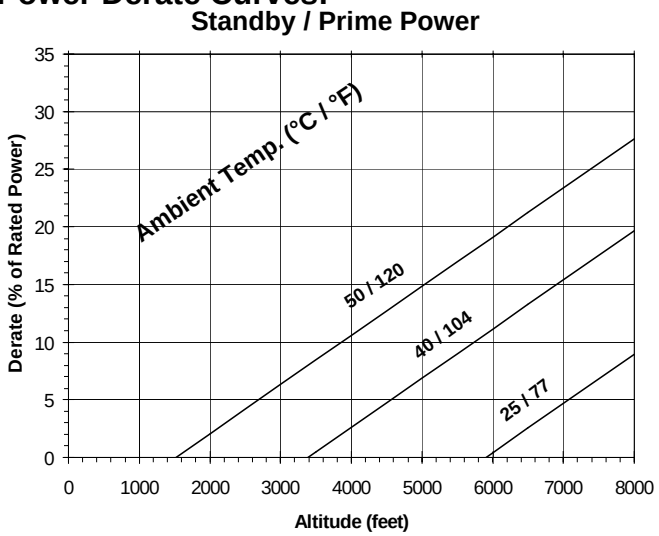
This engine complies with certain emissions requirements established by US EPA/CARB.
See Exhaust Emissions Data Sheet for conformance specifics.

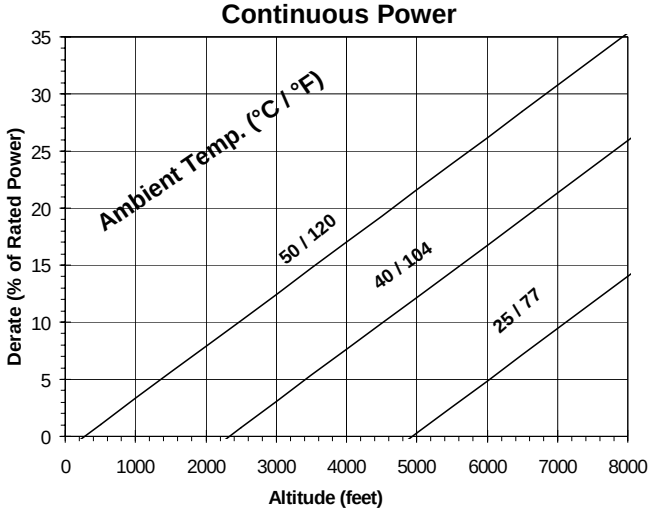
Engine Performance Data @ 1800 RPM

OUTPUT POWER			FUEL CONSUMPTION			
%	kWm	BHP	kg/ kWm·h	lb/ BHP·h	liter/ hour	U.S. Gal/ hour
STANDBY POWER						
100	1656	2220	0.201	0.331	392	103.6
PRIME POWER						
100	1384	1855	0.203	0.334	330	87.3
75	1038	1391	0.211	0.347	257	68.0
50	692	928	0.221	0.364	180	47.6
25	346	463	0.273	0.449	111	29.2
CONTINUOUS POWER						
100	1224	1640	0.208	0.342	299	79.0



Power Derate Curves:





Operation At Elevated Temperature And Altitude:

For sustained operation above these conditions, derate by an additional 4.5% per 300 m (1000 ft), and 10% per 10^o C (18^o F).

CONVERSIONS:(Liters = U.S. Gal x 3.785) (U.S.Gal = Liters x 0.2642)

Data Subject to Change Without Notice

These guidelines have been formulated to ensure proper application of generator drive engines in A.C. generator set installations. **STANDBY POWER RATING:** Applicable for supplying emergency power for the duration of the utility power outage. No overload capability is available for this rating. Under no condition is an engine allowed to operate in parallel with the public utility at the Standby Power rating. This rating should be applied where reliable utility power is available. A Standby rated engine should be sized for a maximum of an 80% average load factor and 200 hours of operation per year. This includes less than 25 hours per year at the Standby Power rating. Standby ratings should never be applied except in true emergency power outages. Negotiated power outages contracted with a utility company are not considered an emergency. **PRIME POWER RATING:** Applicable for supplying electric power in lieu of commercially purchased power. Prime Power applications must be in the form of one of the following two categories:**UNLIMITED TIME RUNNING PRIME POWER:** Prime Power is available for an unlimited number of hours per year in a variable load application. Variable load should not exceed a 70% average of the Prime Power rating during any operating period of 250 hours. The total operating time at 100% Prime Power shall not exceed 500 hours per year. A 10% overload capability is available for a period of 1 hour within a 12-hour period of operation. Total operating time at the 10% overload power shall not exceed 25 hours per year. **LIMITED TIME RUNNING PRIME POWER:** Limited Time Prime Power is available for a limited number of hours in a non-variable load application. It is intended for use in situations where power outages are contracted, such as in utility power curtailment. Engines may be operated in parallel to the public utility up to 750 hours per year at power levels never to exceed the Prime Power rating. The customer should be aware, however, that the life of any engine will be reduced by this constant high load operation. Any operation exceeding 750 hours per year at the Prime Power rating should use the Continuous Power rating.**CONTINUOUS POWER RATING**: Applicable for supplying utility power at a constant 100% load for an unlimited number of hours per year. No overload capability is available for this rating.

Reference AEB 10.47 for determining Electrical Output.

Data shown above represent gross engine performance capabilities obtained and corrected in accordance with ISO-3046 conditions of 100 kPa (29.53 in Hg) barometric pressure [110 m (361 ft) altitude], 25 °C (77 °F) air inlet temperature, and relative humidity of 30% with No. 2 diesel or a fuel corresponding to ASTM D2.
Derates shown are based on 15 in H_20 air intake restriction and 2 in Hg exhaust back pressure.

The fuel consumption data is based on No. 2 diesel fuel weight at 0.85 kg/liter (7.1 lbs/U.S. gal). Power output curves are based on the engine operating with fuel system, water pump and lubricating oil pump; not included are battery charging alternator, fan, optional equipment and driven components.

Data Status: Limited Production

Data Tolerance: ± 5%

Chief Engineer:

D K. Trueblood