

Rating Conditions: Ratings are in accordance with ISO-3046 reference conditions; air pressure at 100 kPa (29.61.in Hg.), air temperature 25°C (77°F), and 30% relative humidity. The fuel consumption data is based on GB252 No.0 diesel fuel (No. 2 diesel fuel in U.S.) weight at 0.85 kg/litre (7.1 lb/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.

Operation at Elevated Temperatures for sustained operation above 40°C (104°F), derate 2% per 11°C (1% per 10° **Prime Power Rating** is applicable for supplying continual electrical power at varied load. The following are the Prime Rating parameters:

* 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.

* There is a 10% overload capability for a period of 1 hour within a 12 hour period of operation. Total operating time at 10% overload shall not exceed 25 hours per year.



Chongqing Cummins Engine Co. Ltd.

Auxiliary Marine Engine Performance Data

		Curve No.: DS: CPL: DATE:	D(M)-802 DS-D093641 CQ125 7-Oct-08
General Engine Data ¹			
Engine Model		NTA85	55-D(M)
Rating Type		Prime Power	Overload
Rated Engine Power	hp [kW]	354 [264]	390 [291]
Governed Engine Speed	rpm	1500	1500
Rated HP Production Tolerance		±2%	
Rated Engine Torque	lb.·ft. [N·m]	1240 [1681]	1367 [1853]
Idle Speed Range		575-650	
Brake Mean Effective Pressure	psi [kPa]	219 [1509]	241 [1663]
Compression Ratio		14.5:1	
Piston Speed	ft/min [m/sec]	1496 [7.6]	
Friction Power	hp [kW]	29 [22]	
Fuel System ¹			
Fuel Consumption	aal/br[l/br]	16.4 [62]	18 [68]
Approximate Fuel Flow to Pump	0 1 1		54 [204]
Maximum Allowable Fuel Supply to Pump Temp			54 [204]
Approximate Fuel Flow Return to Tank			004 [4005]
Fuel Rail Pressure	psi [kPa]		201 [1385]
Weight ¹			
Dry - Engine Only	lb. [kg]	2863 [1300]	
Dry - Engine With Heatexchanger	lb. [kg]	3106[1410]	
Installation Diagram No		491	4572
Hookup Diagram & Drawing, electrical circuit No)	4061349	4061350
Air System ¹			
Intake Manifold Pressure	in Ha [kPa]	N.A.	48 [163]
Intake Air Flow			803 [379]
Heat Rejection to Ambient		1821 [32]	1992 [35]
		1021[32]	1997 [99]
Exhaust System ¹			
Exhaust Gas Flow	cfm [l/sec]	1758 [830]	1991 [940]
Exhaust Gas Temperature (Turbine Out)	°F [°C]	903 [484]	928 [498]
Heat Rejection to Exhaust	BTU/min [kW]	9050 [159]	10018 [176]
Cooling System ¹			
Sea Water Pump Specifications			
Pressure Cap Rating (With Heat Exchanger Op		7 [50]	
Engines without Low Temperature Aftercooler		.[00]	
Jacket Water Aftercooled Engine (JWAC)	(=)		
Coolant Flow to Engine Heat Exchanger	gal/min [l/min]	52 [195]	
Standard Thermostat Operating Range (Min)			
Standard Thermostat Operating Range (Max)			
Heat Rejection to Engine Coolant ³			12067 [212]
	N/A = Not Applicable		. = Not Avaliable
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1. All Data at Rated Conditions.			

2. Consult Installation Direction Booklet for Limitations.

3. Heat rejection to coolant values are based on 50% water/50% ethylene glycol mix and do NOT include fouling factors. If sourcing your own cooler, a service fouling factor should be applied according to the cooler manufacturer's recommendation.

 $\label{eq:consult} \textbf{4. Consult option notes for flow specifications of optional Cummins seawater pumps (if applicable).}$

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All Data is Subject to Change Without Notice - contact CCEC for most recent data .