CATERPILLAR® ENGINE SPECIFICATIONS

I-6, 4-Stroke-Cycle-Diesel
Emissions: IMO Compliant
Bore — mm (in): 125 (4.92)
Stroke — mm (in): 140 (5.51)
Displacement — L (cu in): 10.3 (629)
Rotation (from flywheel end): Counterclockwise
Compression Ratio: 16:1

Capacity for Liquids — L (U.S. gal)
Cooling System (engine only): 45 (12)
Lube Oil System (refill): 28 (7.5)
Oil Change Interval — L (gal): 9475 (2500)/fuel
Engine Weight, Net Dry (approx): 1177 (2590)
Governor: Electronic

DIMENSIONS

STANDARD EQUIPMENT

Air inlet system
  aftercooler
  air cleaner/fumes disposal (closed system)
Cooling system
  thermostat
  jacket water pump
  sea water pump
  integral heat exchanger/expansion tank
Exhaust system
  manifold & turbocharger, water cooled
  152 mm (6 in) round flanged outlet
Flywheel & flywheel housing
  SAE No. 1
Fuel system
  fuel filter
  fuel transfer pump
  fuel priming pump
  flexible fuel lines
Governor
  electronic control system
Lube system
  crankcase breather
  oil cooler
  oil filter
  oil pan, center sump
  oil filler
  dipstick
  oil pump
Mounting system
  front support
Power take-offs
  hydraulic pump drive — SAE A, 11 tooth spline
Service
  service per top level PAs

Power produced at the flywheel will be within standard tolerances up to 50° C (122° F) combustion air temperature measured at the air cleaner inlet, and fuel temperature up to 70° C (158° F) measured at the fuel filter base. Power rated in accordance with NMMA procedure as crankshaft power. Reduce crankshaft power by 3% for propeller shaft power.
PERFORMANCE CURVES

E Rating – 2300 rpm
448 bkW (600 bhp) 608 mhp

Cubic Prop Demand Curve Data
(for displacement hulls only)

<table>
<thead>
<tr>
<th>Speed (rpm)</th>
<th>Power (bkW)</th>
<th>Torque (N•m)</th>
<th>Cons. Rate (g/bkW-hr)</th>
<th>Fuel Rate (L/hr)</th>
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Max Power Curve Data

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E RATING – Planing hull vessels such as pleasure craft, harbor patrol, harbor master, and some fishing and pilot boats.

- Prop Demand 3.0 Exponent (for displacement hulls only)
- Engine Performance Parameters: Power +/- 3%; Specific Fuel Consumption +/- 3%; Fuel Rate +/- 5%.

RATING DEFINITIONS AND CONDITIONS

Ratings are based on SAE J1228/ISO8665 standard conditions of 100 kPa (29.61 in Hg), 25°C (77°F), and 30% relative humidity. These ratings also apply at ISO3046/1, DIN6271/3, and BS5514 conditions of 100 kPa (29.61 in Hg), 27°C (81°F), and 60% relative humidity.

Fuel rates are based on fuel oil of 35° API [16° C (60° F)] gravity having an LHV of 42 780 kJ/kg (18 390 Btu/lb) when used at 29°C (85°F) and weighing 838.9 g/liter (7.001 lbs/U.S. gal).

Additional ratings may be available for specific customer requirements. Consult your Caterpillar representative for additional information.