

PowerTech

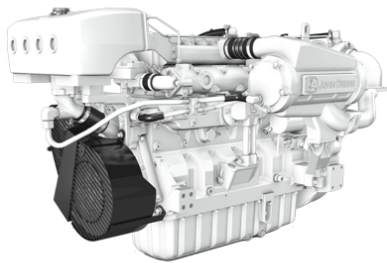
6090AFM75 Diesel Engine

Propulsion Engine Specifications

Offshore Marine Services
Burtonport Co Donegal Ireland
offshoreireland@3mail.ie

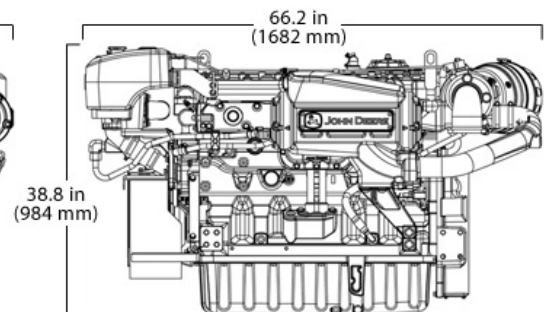
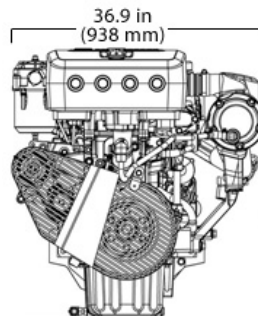


JOHN DEERE



6090AFM75 shown

Dimensions



Certifications

EPA Commercial Marine Tier 2
IMO MARPOL Annex VI Compliant

General data

Model	6090AFM75	Length - mm (in)	1682 (66.2)
Number of cylinders	6	Width - mm (in)	938 (36.9)
Displacement - L (cu in)	9.0 (549)	Height, Centerline to Top-- mm. (in)	665 (26.2)
Bore and Stroke-- mm (in)	118 x 136 (4.65 x 5.35)	Height, Centerline to Bottom-- mm. (in)	319 (12.6)
Compression Ratio	16.0 : 1	Weight, dry-- kg (lb)	1011 (2229)
Engine Type	In-line, 4-Cycle	Maximum Installed Angle	Front Up – degrees 12 Front Down – degrees 0
Aspiration	Turbocharged and air-to-coolant aftercooled		

Features and benefits

Watercooled Turbocharger and Exhaust Manifold

- Cooler and quieter environment for vessel and crew
- Reduced external connections eliminates hoses and fittings that can leak or break

Directed Top-liner Cooling

- Reduces upper liner temperature by as much as 100 degrees Fahrenheit (54 degrees Celsius)
- Durable and reliable power cylinder components

Replaceable Wet-type Cylinder Liners

- Hardened and precision machined for long life

Front or Side Service

- Oil and fuel filter combinations
- Application and service flexibility to provide installation convenience plus fast and easy maintenance

Cooling System

- High-capacity heat exchanger designed for reliable operation in adverse conditions
- Available as keel cooled

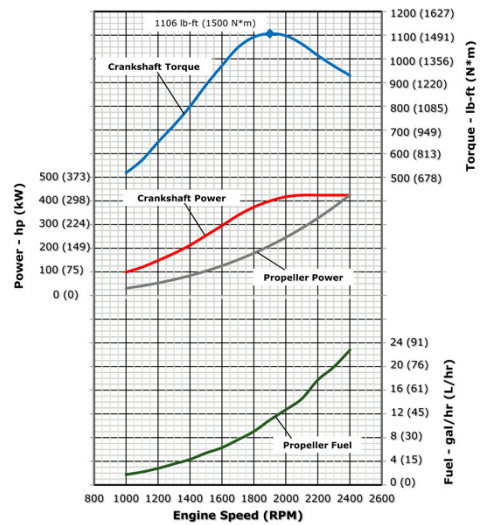
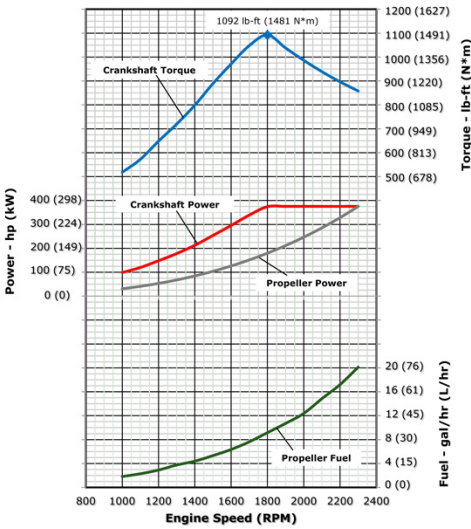
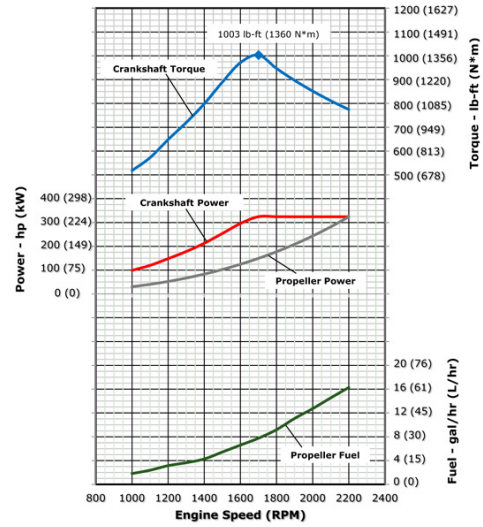
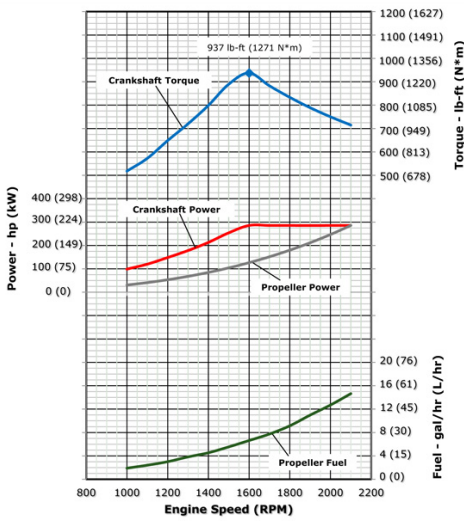
High Torque and Low Rated RPM

- Excellent vessel control and maneuvering
- Lower rated rpm limits vibration and noise for better crew comfort

Fuel System

- Electronically controlled high pressure common rail fuel system provides precise fuel delivery with variable timing resulting in excellent fuel economy and performance
- Self diagnostics and protection

Performance curve



Performance data	M4	M3	M2	M1
Rated Power - kW (hp)	317 (425)	280 (376)	242 (325)	213 (285)
Rated Speed - rpm	2400	2300	2200	2100
Low Idle Speed - rpm	650	650	650	650
Peak Torque - Nm (ft-lb)	1500 (1106)	1481 (1092)	1360 (1003)	1271 (937)
Peak Torque Speed - rpm	1900	1800	1700	1600
Fuel Consumption - L/h (gal/hr)	90.7 (24.0)	79.6 (21.0)	67.1 (17.7)	57.8 (15.3)

M rating	M4	M3	M2	M1
Typical load factor	40 %	50 %	65 %	> 65 %
Typical annual usage (hr)	800	2000	3000	> 3000
Typical full-power operation (hr)	1 of each 12	4 of each 12	16 of each 24	24 Uninterrupted

John Deere Power Systems
 3801 W. Ridgeway Ave.
 PO Box 5100
 Waterloo, IA 50704-5100
 Phone: 1-800-533-6446
 Fax: 319.292.5075

John Deere Power Systems
Usine de Saran
 La Foulonnerie - B.P. 11.13
 45401 Fleury les Aubrais Cedex
 France
 Phone: 33.2.38.82.61.19
 Fax: 33.2.38.82.60.00

Preliminary Information
 All values at rated speed and power with standard options unless otherwise noted.
 Specifications and design subject to change without notice.