PowerTech[™] 6135AFM85 Diesel Engine

Marine Propulsion Engine Specifications

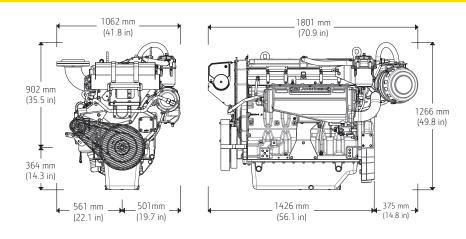




Emissions

EPA Commercial Marine Tier 3 IMO MARPOL Annex VI Compliant NRMM (97/68/EC) as amended

Dimensions



Dimensions shown in mm (in) may vary according to options selected. Contact your distributor for more information.

General Data (based on standard option configuration)

Model	6135AFM85
Number of cylinders	6
Displacement – L(cu in)	13.5 (824)
Bore and Stroke – mm (in)	132 x 165 (5.2 x 6.5)
Engine Type	In-line, 4-cycle
Aspiration	Turbocharged and air-to-coolant aftercooled

Classification Societies

SOLAS - Accessories available*

ABS, DNV, BV, LR

Length maximum – mm (in)	1801 (70.9)
Length to rear face of flywheel housing – mm (in)	1426 (56.1)
Flywheel housing SAE	SAE #1
Width maximum – mm (in)	1062 (41.8)
Crankshaft centerline right – mm (in)	501 (19.7)
Crankshaft centerline left – mm (in)	561 (22.1)
Height – mm (in)	1266 (49.8)
Height, crankshaft centerline to top – mm (in)	902 (35.5)
Height, crankshaft centerline to bottom – mm (in)	364 (14.3)
Weight, dry – kg (lb)	1410 (3108)

Engine Specifications			
Performance ratings	Power kW (bhp)	Rated Speed (rpm)	Rated fuel consumption L/hr (gal/hr)
M1	272 (365)	1800	76.7 (20.3)
M2	317 (425)	1900	86.2 (22.8)
M3	373 (500)	2000	102 (27.0)
M4	429 (575)	2100	119 (31.4)

Metric $hp = Brake hp \times 1.01387$

M rating	M1	M2	M3	M4
Typical load factor	>65%	≤65%	≤50%	≤40%
Typical Annual Usage (hr)	Unrestricted	3,000-5,000	2,000-4,000	1,000-3,000
Typical full-power operation (hr)	Uninterrupted	16 of each 24 hr	4 of each 12 hr	1 of each 12 hr

Ratings are based on ISO 8655 standard power rating and the SAE J1228 crankshaft power rating. For easier installation, JDPS offers a range of options to fit your needs.

See your John Deere Power Systems engine distributor or marine dealer for more detailed performance information.

^{*}Other accessories available. Contact your distributor for details.

Features and Benefits

High-torque and low rated RPM

- High torque provides excellent vessel control and maneuverability
- Lower rated propulsion RPM reduces vibration and noise for improved crew comfort

Electronic unit injectors (EUI)

- The EUI fuel system provides higher injection pressures
- Controls fuel injection timing and provides precise control for start, duration, and end of injection

Replaceable cylinder liners

- Replaceable wet-type cylinder liners are precision-machined and hardened for long life
- Allows engine to be rebuilt to original specifications

Multiple service options

 Either-side oil fill/dipstick combinations and remote oil filter options are available for easier service access

4-valve cylinder head

 Excellent airflow through 4-valve cylinder head delivers greater low-speed torque and better transient response time

Water-cooled exhaust manifold

- Integrated components eliminate external hoses and fittings that can leak or break
- Wet exhaust manifold creates a cooler and quieter environment for passengers and crew

Electronic engine control unit (ECU)

- Advanced fault code diagnostics and customizable engine protections ensure reliability and uptime
- Provides highly customizable features and trim to integrate your vessel

Keel-cooled or heat exchanger

- Closed cooling system in keel-cooled engine option eliminates the need for a sea strainer, seawater pump, or anodes
- Heat exchanger option offers a lighter, more compact, and simpler installation for the vessel