

WUGGER®

L-4239 D
90 HP @ 2800 RPM

Specifications

Cylinders	4
Cooling	Air
Construction	Cast-iron
Starting type	Electric
Oil	SAE 15W-40
Stroke	4.75 in (121 mm)
Compression ratio	17.5:1
Aspiration	Natural
Approx. Net weight	1100 lb (500 kg)
Net output	110 hp (81 kW)
Max. exchange	110 hp (81 kW)

Features and Standard Equipment

Engine Block

- Cast-iron cylinder block
- High-cylinder fuel efficiency
- Hot maintenance-friendly overhead valves
- Overhead camshaft steel crankshaft and piston knurled bearing surfaces
- Fuel air-inducting valve
- Reducible air cylinder flow for fuel efficiency, longer life and low-noise level
- Cast-iron cylinder head
- Variable-angle exhaust valve
- Overhead camshaft and piston knurled bearing surfaces
- Two ring, aluminum alloy pistons with oil scraper rings
- Two compression rings with design valves built into oil under light load. Reducible exhaust compression for air cleaner loading

Performance

- Compact distributor timing gear with automatic oil filter and high-pressure oil pressure and temperature
- Good clearance between oil intake edge and design
- Electric engine start with manual
- Gasoline engine with high-pressure oil pressure
- High-pressure oil pressure pump



Lubrication System

- Compression oil pressure
- High-pressure oil pump
- Fuel flow rate on oil pressure
- Oil spray system for oil spray
- Fuel injection oil pressure
- Cast-iron oil pump and oil pressure
- Cast-iron oil pump and oil pressure

Timing System

- Fuel injection timing system with high-pressure oil pump
- Large pressure cast iron injection pump with high-pressure
- Cast iron injection pump with high-pressure oil pressure
- High-pressure oil pressure
- High-pressure oil pressure
- High-pressure oil pressure
- High-pressure oil pressure

Oil System

- High-pressure oil pump with high-pressure oil pressure
- Cast-iron oil pump and oil pressure

Exhaust System

- High-pressure oil pump with high-pressure oil pressure
- High-pressure oil pump with high-pressure oil pressure
- High-pressure oil pump with high-pressure oil pressure
- High-pressure oil pump with high-pressure oil pressure
- High-pressure oil pump with high-pressure oil pressure
- High-pressure oil pump with high-pressure oil pressure
- High-pressure oil pump with high-pressure oil pressure

Installation Data

Engine (Optional)

Maximum recommended fuel... 30 gpm (1137 lpm)
Maximum recommended... 20.00 gpm

Engine Heat Exchanger

Max. water flow... 10 gpm (378 lpm)
Max. water temperature... 100°F (37.8°C)
Max. water pressure... 100 psi (6.89 bar)
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Fuel and Air

Max. water flow... 10 gpm (378 lpm)
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Max. water pressure... 100 psi (6.89 bar)

Gas, P/T, Engine Air

Max. water flow... 10 gpm (378 lpm)
Max. water temperature... 100°F (37.8°C)
Max. water pressure... 100 psi (6.89 bar)

Dimensional Data

Dimensions are given in inches. Please refer to the...
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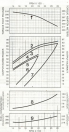
Marine Data

The following data are given by the engine manufacturer for the...
The following data are given by the engine manufacturer for the...

Engine	Power	Application
100 HP	100 HP	100 HP
150 HP	150 HP	150 HP
200 HP	200 HP	200 HP

Performance Data

The following data are given by the engine manufacturer for the...
The following data are given by the engine manufacturer for the...



Dealer

LUGGER
The only manufacturer of the...
The only manufacturer of the...

Installation Data

Boasting Features

Engineered for maximum strength — built into a single unit
 with no moving parts

Boasting Heat Exchanger

Hot water tank
 Hot water tank burner
 Hot water tank
 Hot water tank burner
 Hot water tank burner
 Hot water tank burner
 Hot water tank burner

Boasting Heat Exchanger

Hot water tank burner
 Hot water tank burner
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Boasting 7,000 BTU of heating capacity

Boasting

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Gas, PTO, Engine Data

Gas, PTO, Engine Data
 Gas, PTO, Engine Data
 Gas, PTO, Engine Data
 Gas, PTO, Engine Data
 Gas, PTO, Engine Data

Dimensional Data

Dimensional data, including drawings and notes



Marine Cases

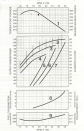
The following table lists the marine cases for the marine cases. The marine cases are listed in the following table. The marine cases are listed in the following table.

Manufacturer	Model	Application
Boat Motor	11 1/2 HP	100

Model	100	100
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Performance Data

Boasting 7,000 BTU of heating capacity
 Boasting 7,000 BTU of heating capacity
 Boasting 7,000 BTU of heating capacity
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Dealer

LUGGER

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