

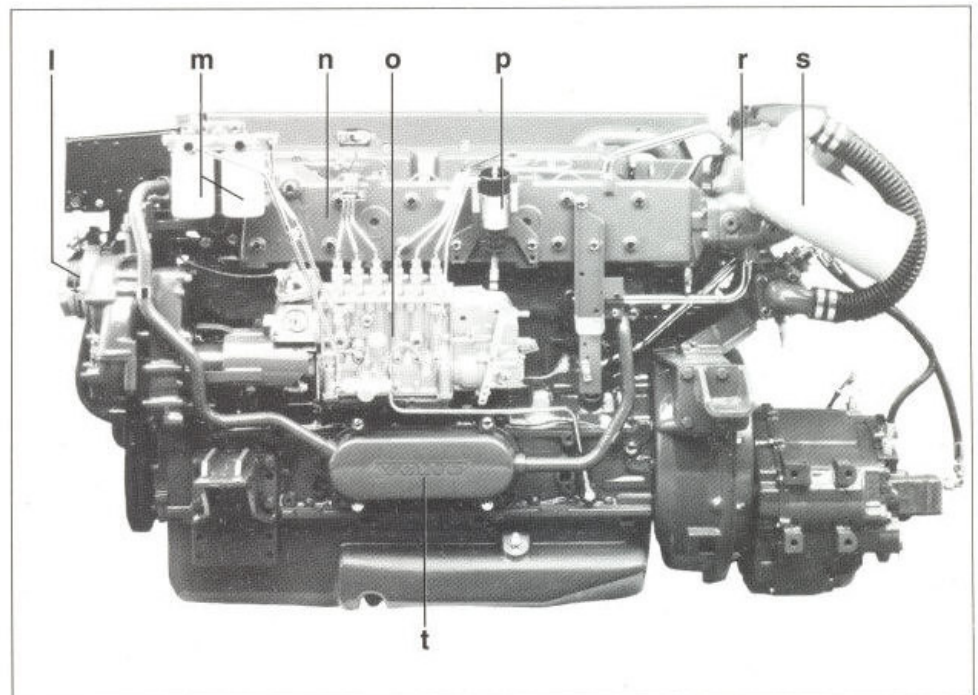
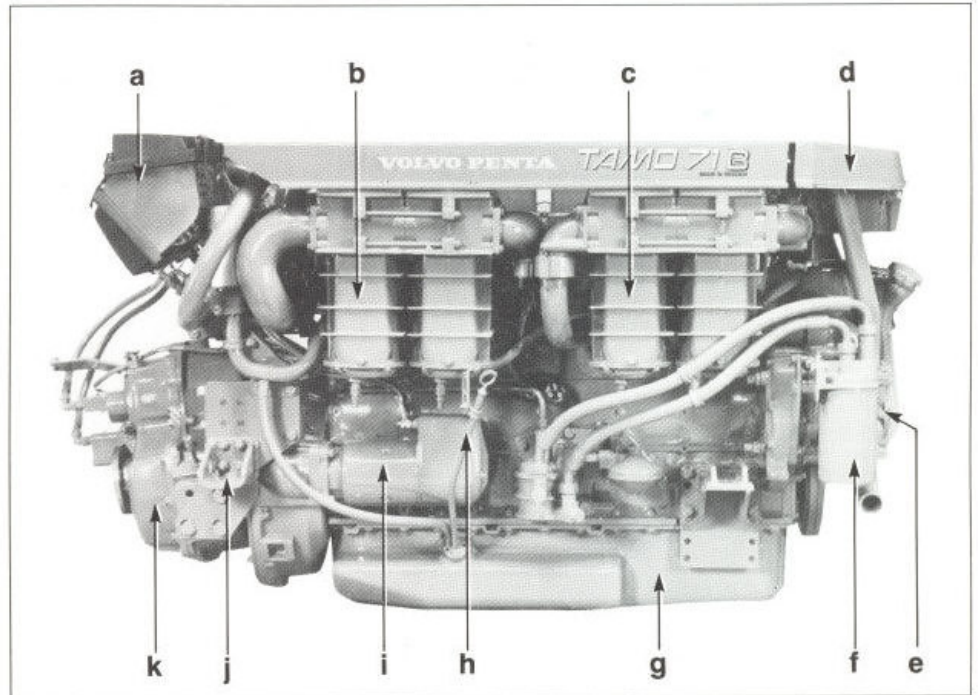
# TAMD 71B

**Special Light Duty (SLD), Light Duty (LD), Medium Duty (MD), Heavy Duty (HD)**  
**6-cylinder, 4-stroke, direct injected turbo-charged marine**  
**diesel engine with after-cooler – crankshaft power\* 280 kW (380 hp)**

\* Power rating – see General Data

## Compact, powerful marine diesel

- A powerful, reliable and economical marine diesel built on the dependable in-line six design.
- Developed for
  - fast planing craft of up to 50 feet
  - planing hulls with great demands on speed and acceleration characteristics
  - semi-planing workboats in Medium duty operation
  - displacement workboats in Heavy duty operation
- Automatic heating of induction air ensures reliable starting at low temperatures.
- Designed for easiest, fastest and most economical installation.
- Well balanced to produce smooth and vibration-free operation with low noise level.
- Comprehensive programme of factory fitted equipment for perfect matching to specific customer requirements, e.g. reverse gears, PTO's, cooling systems, electrical systems.
- Freshwater-cooled oil cooler and piston cooling for maintaining of stable temperature in cylinders and combustion chambers.
- Smoke limiter for reduction of smoke during acceleration and heavy loads.
- A by-pass valve between turbocharger and aftercooler reduces white fume emission during start and low load operation.
- Generously sized air exchange and injection system produces optimum fuel-air mixture and contributes to reduced emission levels and reduced fuel consumption.
- Simple, thus time and cost saving servicing with gear-driven circulation and seawater pumps and location of the oil filter in front of the engine.
- Well-established network of authorized service in more than 100 countries, providing Genuine Parts and skilled personnel to ensure that you enjoy the best possible service.



The engine shown may vary from the standard unit.

- |                             |                                    |                            |
|-----------------------------|------------------------------------|----------------------------|
| a. Air filter, paper type   | h. Oil dipstick                    | n. Wet exhaust manifold    |
| b. Aftercooler, watercooled | i. Starter motor                   | o. Injection pump          |
| c. Heat exchanger           | j. Adjustable rear engine mounting | p. Stop solenoid           |
| d. Thermostat housing       | k. Reverse gear                    | r. Turbo charger           |
| e. Sea water pump           | l. Extra alternator                | s. Exhaust elbow, dry type |
| f. Front mounted oil filter | m. Twin fuel filter                | t. Oil cooler              |
| g. Oil sump                 |                                    |                            |

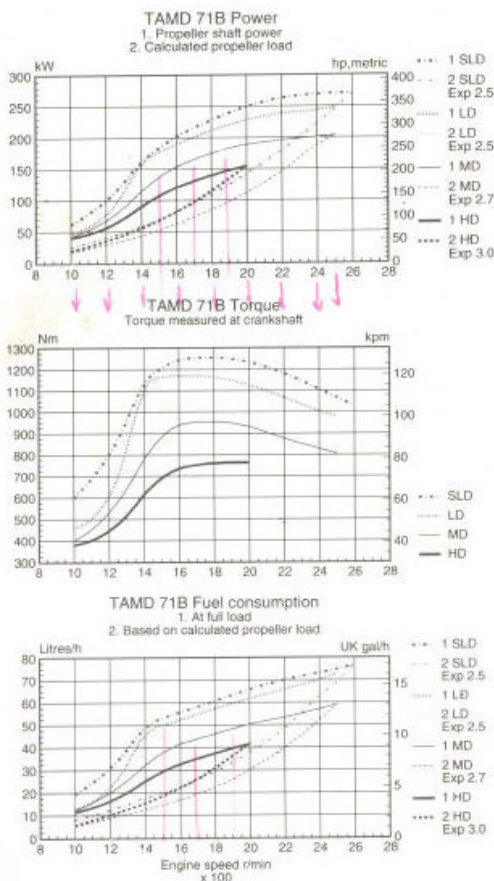
**VOLVO  
PENTA**



## General data

Type designation	TAMD 71B
No of cylinders	6
Configuration	4-stroke direct-injected turbocharged with aftercooler diesel engine
Fuel grade EN590	1D or 2D
Bore, mm (in)	104.7 (4.12)
Stroke, mm (in)	130 (5.12)
Displacement, litres (in <sup>3</sup> )	6.73 (411)
Compression ratio	14:1
Dry weight, kg (lb)	880 (1940)
Crankshaft output, <sup>1)</sup>	
at crankshaft speed, r/min	
SLD, kW (hp) (2600 r/min) ▲	280 (380)
LD, kW (hp) (2500 r/min)	257 (350)
MD, kW (hp) (2500 r/min)	210 (286)
HD, kW (hp) (2000 r/min)	160 (218)
Torque <sup>2)</sup>	
SLD, Nm (ft, lb)	1027 (757)
LD, Nm (ft, lb)	1000 (738)
MD, Nm (ft, lb)	821 (606)
HD, Nm (ft, lb)	778 (574)
Spec. fuel consumption <sup>2)</sup>	
SLD, g/kWh (lb/hph)	230 (0.37)
LD, g/kWh (lb/hph)	238 (0.39)
MD, g/kWh (lb/hph)	236 (0.38)
HD, g/kWh (lb/hph)	218 (0.35)
Propeller shaft power kW (hp) at crankshaft speed	271 (367)

- 1) Technical data according to ISO 3046 Standard Fuel Stop Power. Fuel 40°C (104°F), lower calorific value of 42700 kJ/kg and density of 840 g/litre.
- 2) Torque and specific fuel consumption apply at the specified crankshaft output.



## Basic engine equipment

Flywheel housing, flange size SAE 2  
 Engine brackets  
 Freshwater cooled turbocharger and exhaust manifold  
 Seawater cooled aftercooler  
 Air cleaner, paper type  
 Fuel injection pump with centrifugal regulator and smoke limiter  
 Feed pump and double fine fuel filters  
 Oil and fuel filters of spin-on type  
 Fresh water cooled oil cooler  
 Starter motor 24 V  
 Oil separating filter for crankcase ventilation  
 Pump coupling cover  
 Two-pole electrical system, 24 V  
 Alternator 24 V/60 A  
 Stop solenoid, 24 V  
 Pre-heater element, incl relay  
 Oil pressure and coolant temperature senders  
 Alarm switches for oil pressure and coolant temperature  
 Electrical terminal box with semi-automatic fuses  
 Flywheel  
 Attachment for control cable, type 333 or 443  
 Engine frame

## Technical description

- Engine block and cylinder heads are made of cast iron alloy.
- Two cylinder heads. A flame barrier protects the cylinder head gasket.
- Replaceable cylinder liners and valve seatings.

- Nitrocarbonized crankshaft with seven bearings
- Oil-cooled, forged aluminium pistons.
- Three piston rings the upper of which is of the keystone type.
- Identical matrix for heat exchanger and aftercooler make them fully interchangeable
- Induction air heater for reliable low temperature starting.

## Fuel system

- Injection pump with centrifugal governor and smoke limiter
- Fuel feed pump
- High pressure fuel lines
- Twin fine fuel filters

## Cooling system

- Seawater-cooled charge air cooler
- Gear-driven freshwater pump and front mounted sea water pump with neoprene impeller.

## Lubrication system

- Fresh water cooled oil cooler
- Frontmounted oil filter of spin-on type

## Turbo-charger

- Freshwater cooled turbo-charger
- By-pass valve between the turbocharger and aftercooler - less white smoke on starting and low load operation.

## Electrical system

- 12 or 24 V electrical system incl alternator, 60 or 40 A respectively, and charging sensor.
- Rubber suspended electrical terminal box with automatic fuses.

## Standard reverse gear alternative:

- MG 507A-1

