

**General Engine Data:**

Type	Four stroke, Diesel engine	
Aspiration	Turbocharged and Intercooled	
Cylinder arrangement	In-line	
No. of Cylinders	6	
Bore	130	mm
Stroke	140	mm
Displacement	11.63	liter
Compression ratio	16 : 1	
Dry weight	1050	kg

**Performance Data**

Engine output	Light Duty (propulsion)	315 kWm / 2000 rpm
	Medium Duty "	295 kWm / 2000 rpm
	Heavy Duty "	275 kWm / 2000 rpm
	Marine Auxiliary	218 kWm / 1500 rpm + 10%
	Marine Auxiliary	240 kWm / 1800 rpm + 10%
Idling speed		550 rpm
Max. overspend capacity		2300 rpm

**Engine mounting**

Max. bending moment at face of flywheel housing	1000	Nm
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**Air inlet system**

Max. allowable inlet air restriction	5.0	kPa
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**Exhaust system**

Max. allowable back pressure	9.0	kPa
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**Lubricating system**

Oil pressure at idle	65	kPa
Oil pressure at rated speed	350	kPa
Maximum oil temperature	115	°C
Oil pan capacity (high level)	25	Liter
Oil pan capacity (low level)	17	liter
Total capacity	29	liter
Max. installation angle	Front Up	4.5 °
	Front Down	0 °
Max. Operating angle	Front Up	35 °
(steel sump)	Front Down	35 °
	Side to Side	35 °

**Cooling system**

Coolant capacity (engine only)	25	liter
Max. external friction head at engine outlet	75	kPa
Standard thermostat range	78-90	°C
Max. allowable coolant temp. at engine outlet	100	°C
Max. allowable pressure cap	70	kPa
Max. recommended coolant temp. at engine outlet	90	°C
Min. coolant expansion space	10	%

**Fuel system**

Fuel Injection Pump Type	Bosch P6 pump + RQV(K)
Firing Order	1-5-3-6-2-4

**Starting system**

Battery charging alternator	55	Ah
Starter motor capacity	5.4	kW
Recommended min. battery capacity	160	Ah

**Accessory Equipment**

Air cleaner	Dry type
Exhaust manifold	Water cooled
Turbocharger	Water cooled
After Cooler	Raw water cooled
Sump breather	Closed type
Governor (propulsion)	Mechanical (+/- 8 % droop)
Governor (auxiliary)	" (+/- 5 % droop)
Fuel Injection Pipe	Single tube
Fuel injection pipe (option)	threaded
Fuel Filter	Single element
Fuel filter (option)	Change-over
Lubricating oil cooler	Pipe cooler
Lubricating oil filter	Single element
Lubricating oil filter (option)	Change-over
Oil sump	Steel
Oil sump (option)	Aluminium
Fresh Water Cooling Pump	Engine driven
Raw water pump (option)	Engine driven

**Accessory Equipment (second part)**

Starter	Earth Float Type
Alternator	Earth Float Type
Stop Solenoid (propulsion)	ETS
Stop solenoid (auxiliary)	ETR
Engine support	Standard
Accessory Drive (two v-belts)	Option
Accessory Drive (two v-belts and in-line power take off)	Option

**Accessory Equipment (Loose supply)**

Tools

Bearing over tool