6WTAA35-G31

◎ **Power**

Engine Speed r/min	Type of Operation	Engine Power		
		kW	KVA	Ps
1500	Prime Power	882	1000	1200
	Standby Power	970	1100	1320

-. The engine performance is as per GB/T2820

-. Ratings are based on GB/T1147.1.

→**Prime Power**：--- There is no time limit in the case of variable load operation. In any 250hours of continuous operation period, the variable load of average work load less than 70%of the prime power. The operation time in the situation of 100%prime power no more than 500 hours. Permit 10%overload running1hours in any 12 hours of continuous operation period. The overload 10% power running time of every year no more than 25 hours..

→**Standby Power**：The annual total standby power load should be less than 80%and the average running time shall be less than200 hours. Among them the standby power point should be no more than 25 hours a year.。

◎ SPECIFICATIONS

○ Engine Model	6WTAA35-G31
○ Engine Type	In-line,4strokes,,water-cooled, Turbo charged with aftercooler
○ Combustion type	Direct injection
○ Cylinder Type	Wet liner
○ Number of cylinders	6
○ Bore × stroke	186 × 215 mm
○ Displacement	35.1L
○ Compression ratio	15 : 1
○ Firing order	1-5-3-6-2-4
○ Injection timing	Electronic control
○ Dry weight	Approx.4000kg
○ Dimension (L×W×H)	2429×1387×2146mm
○ Rotation	SAE NO.0
○ Fly wheel housing	SAE NO.18(tooth number of gear:164)

◎ FUEL CONSUMPTION

○ Power	L/h
25%	55.2
50%	92.9
75%	136.6
100%	188.1
110%	209.4

◎ FUEL SYSTEM

○ Injection pump	Hengyang
○ Governor	Hengyang
○ Feed pump	Electronic Control
○ Injection nozzle	Multi hole type
○ Fuel filter	Full flow, cartridge type
○ Used fuel	Diesel fuel oil

◎ MECHANISM

○ Type	Overhead valve
○ Number of valve	Intake 2, exhaust 2 per cylinder
○ Valve lashes at cold	Intake 0.4mm Exhaust 0.45mm

◎ LUBRICATION SYSTEM

○ Lub. Method	Fully forced pressure feed type
○ Oil pump	Gear type driven by crankshaft
○ Oil filter	Full flow, cartridge type
○ Oil pan capacity	High level 100 liters Low level 75 liters
○ Angularity limit	Front down 25 deg. Front up 35 deg. Side to side 35 deg.
○ Lub. Oil	Refer to Operation Manual

◎ VALVE TIMING

	Opening	Close
○ Intake valve	40° BTDC	48° ABDC
○ Exhaust valve	54° BBDC	30° ATDC

◎ COOLING SYSTEM

○ Cooling method	Fresh water forced circulation

◎ ENGINEERING DATA

○ Heat rejection to coolant	36.8kcal/sec（1500r/min）

○ Water capacity (engine only)	78 liters
○ Water pump	Centrifugal type driven by belt
○ Water pump Capacity	1000L/min （1500r/min）
○ Thermostat	Wax–pellet type Opening temp. 77°C Full open temp. 90°C
○ Cooling fan	Blower type, plastic 1371 mm diameter, 8blades Power consumption 30kw

○ Heat rejection to intercooler	22.7kcal/sec（1500r/min）
○ Air flow	64.9m3/min （1500r/min）
○ Exhaust gas flow	162.6m3/min（1500r/min）
○ Exhaust gas temp.	650 °C
○ Max. permissible restrictions	3 kPa initial 6 kPa final (need charge filter element)
Intake system	
Exhaust system	11 kPa max.
○ Max. permissible altitude	2000 m
○ intercooler permissible restrictions	16 kPa

◎ ELECTRICAL SYSTEM

○ Charging generator	27V×55A
○ Voltage regulator	Built-in type IC regulator
○ Starting motor	24V×13kW
○ Battery Voltage	24V
○ Battery Capacity	200 AH