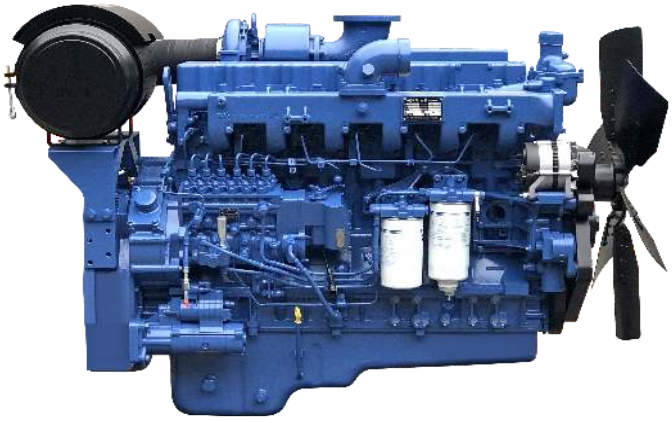
# YC6MJ500L-D21

Version No.: 2020V02 Implemented on: 2020-06-20

**Prime power: 334 kW @ 1500 r/min**

**Standby power:367 kW @ 1500 r/min**

For clients in the places where emission regulations have not been implemented yet.



(Image shown may not reflect actual engine)

## Introduction

YC6MJ series engines are developed and designed with internationally advanced design concept and methods as well as several technological achievements in modern diesel engine research. The engine has strong power, reliable quality, high efficiency and fuel efficiency, and its indicators reach the internationally advanced level.

## Product Features

- Integral crankcase and integral cylinder head are adopted, which ensure good reliability. Wet cylinder liner is adopted, which ensures the wear resistant and easy maintenance.
- The advanced technology of four-valve + high-efficiency turbocharged & intercooled is adopted, ensuring sufficient air inflow and sufficient combustion at low fuel consumption.
- The internal cooling oil passage technology is adopted for piston, the engine oil flowing through the piston removes the piston heat in time so that the piston can withstand higher combustion temperature, making the engine highly reliable.
- Special piston seal technology and valve oil seal technology are adopted, making the engine oil consumption low.
- G3 performance requirements for generator set are met.

## Product Service

- Service: Yuchai has built the largest service network in the industry with the minimum service radius, the most extensive “three guarantees” and the shortest response time. 49 global offices are set up, including 14 overseas offices in Europe, Africa and South America etc. Besides, 108 overseas service agents, more than 3,000 service stations and 5,000 sales networks of fittings are established, providing the users with satisfying and considerate services.
- 24h global service hotline: +86 95098.

| Engine speed | Application | Standard generator unit output | | Engine power | | | |
|---|---|---|---|---|---|---|---|
| | | | | Total power | | Net power | |
| r/min | | kVA | kW | kW | Ps | kW | Ps |
| 1500 | Prime | 375 | 300 | 334 | 454 | 321 | 437 |
| | Standby | 412 | 330 | 367 | 499 | 352 | 479 |

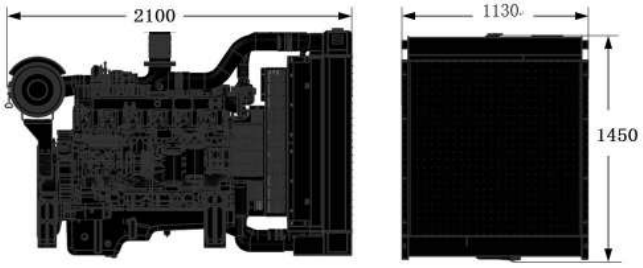
## ✧ Notes:

1. Prime Power: which corresponds to the basic power (PRP) described in ISO 8528. Implement the maintenance according to the Yuchai's requirement, maximum power of variable load continuous output unlimited time. The average output power shall not exceed 70% of the prime power in every 24 hours of operation.

   Standby Power: In correspondence with the emergency standby power (ESP) stated in ISO 8528. Implement the maintenance according to the Yuchai's requirement, maximum power at a variable load in the event of a main power network failure up to a maximum of 200 hours per year. The average output power shall not exceed 70% of the standby power in every 24 hours of operation.
2. The engine power data stated in the table is the measured performance under the condition stated in ISO 8528-1 and ISO 3046.
3. The power output of the generator unit is calculated according to the efficiency of the AC generator. Thus, it is for reference only.
4. The kVA and kW values are converted as per standard power factor 0.8.
5. The information mentioned above is the latest one, however, the relevant information may be altered after publication.

| Engine load | 1500 r/min | |
|---|---|---|
| | g/（kW·h） | L/h |
| Standby power | 203. 76 | 89. 6 |
| Prime power | 201. 75 | 80. 7 |
| 75% prime power | 200. 08 | 60. 0 |
| 50% prime power | 205. 28 | 41. 1 |

Remarks: the diesel oil density is 0.835 kg/L.




## Technical Data

| | |
|---|---|
| Type | Vertical, in-line, water-cooled, four-stroke |
| Induction system | Turbocharged & Intercooled |
| Type of combustion chamber | Direct-injection reentrant ω combustion chamber |
| Cylinder quantity - Bore x stroke. | 6-131×145mm |
| Number of valve per cylinder. | 4 |
| Displacement | 11.73L |
| Compression ratio | 16.8:1 |
| Cylinder type | Wet-type cylinder sleeve |
| Working sequence | 1-5-3-6-2-4 |
| Fuel supply system | Mechanical pump + electronic governor |
| Lubrication mode | Combination of pressure and splashing |
| Starting mode | Electronic |
| Engine oil capacity | 37L (dry-type engine) |
| Engine oil and fuel consumption ratio | ≤0.1% |
| Rotation | Anticlockwise (facing the power delivery end) |
| Minimum no-load speed. | (650～700) r/min |
| Speed-regulation grade | ISO 8528 G3 |
| Noise *Lp* | ≤100 dB(A) |
| Total dry weight | |
| Engine | 1050 kg |
| Radiator | 155 kg |

The final weight and sizes of the engine varies according to the specific arrangement.

## Engine Arrangement

- **Air Intake System**
  Air filter
- **Cooling system**
  Radiator (optional)
- **Electrical device**
  24 V electric system
  Inlet preheater (optional)
- **Fuel system**
  Fuel Filter
- **Lubrication system**
  Engine oil filter
- **Flywheel and flywheel housing**
  SAE 14″ flywheel
  SAE 1# flywheel housing
- **Documents**
  Operation Instruction
  Installation Guide
  Parts catalog

Fuel grade: Summer: 0# and 10# ordinary diesel oil of GB 252-2015 premium grade or first grade. Winter: 0#, -10#, -20#, and -35# ordinary diesel oil of GB 252-2015 premium grade or first grade.

Oil brand: 15W-40 in summer; 10W-30 or other environmentally suitable diesel engine oils with the quality grade not lower than Grade CH-4 as provided in GB 11122-2006 in winter.