



4JH Series - 45 / 57

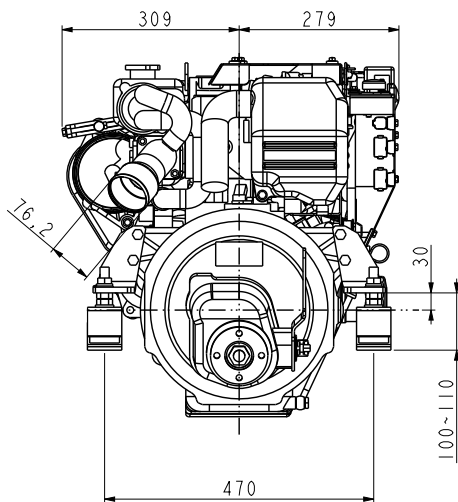
| | | |
|-------------------------------------|---|-----------------------|
| Configuration | In-line, 4-stroke, vertical, water-cooled diesel engine | |
| Max. output at crankshaft* | 33.1 kW@3000 rpm | [45 mhp@3000 rpm] |
| | 41.9 kW@3000 rpm | [57 mhp@3000 rpm] |
| No. of cylinders | 4 cylinder | |
| Displacement | 2.190 L | [134 cu in] |
| Bore x stroke | 88 mm x 90 mm | [3.46 in x 3.54 in] |
| Aspiration | Natural | |
| Combustion system | Direct injection, Bosch common rail system | |
| Starting system | Electric starting 12V - 1.4 kW | |
| Engine management | Electronic | |
| Cooling system | Fresh water cooling by centrifugal fresh water pump | |
| | Seawater cooling by rubber impeller seawater pump | |
| Alternator | 12V - 125A | |
| Lubrication system | Enclosed, forced lubricating system | |
| Engine lube oil specifications | API class: CD or higher, SAE grade: 10W-30 or 15W-40 | |
| Direction of rotation at crankshaft | Counterclockwise (CCW) viewed from stern | |
| Dry weight without gear | 220 kg | [485 lbs] |
| Engine dimensions† L x W x H | 870 x 589 x 627 mm | |
| Emission compliance | EU: RCD 2, BSO II, EMC | US: EPA Tier 3, EPA-C |
| Flywheel housing size | SAE #5 | |
| Controls | Mechanical (optional - VC20 system) | |

NOTE: Fuel condition: Density at 15°C = 0.84 g/cm³; 1 kW = 1.3596 mhp = 1.3410 HP
 Technical data is according to (ISO 8665) / (ISO 3046)

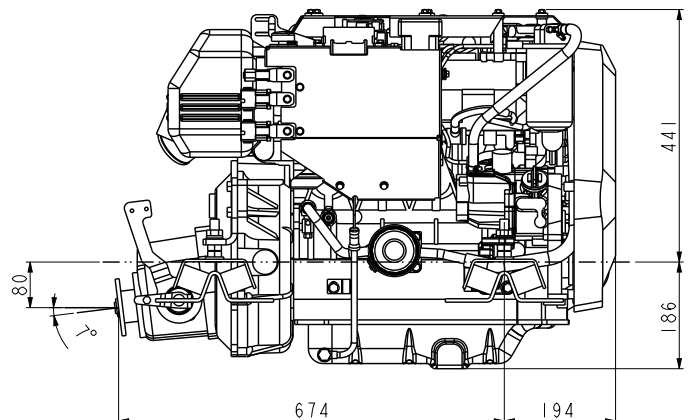
* Fuel temperature 40°C at the inlet of the fuel injection pump (ISO 8665)

†Length includes KM35P marine gear (Dimensions may vary with other gears/elbow)

DIMENSIONS

Rear view

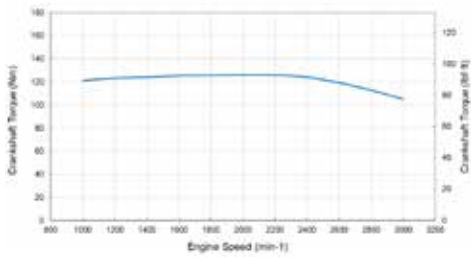
4JH45/57 with KM4A1 marine gear
 (Not to be used for engine installation)

Right side view

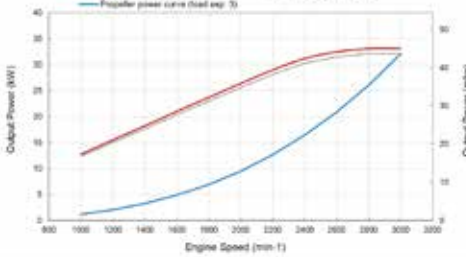


PERFORMANCE CURVES

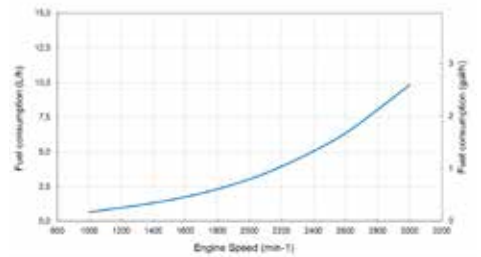
4JH45 Torque curve



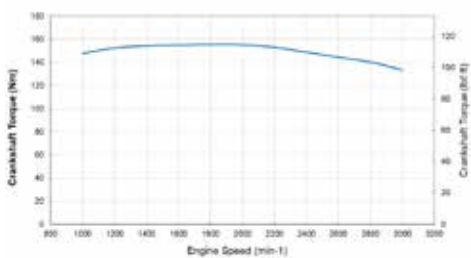
4JH45 Output Power curve



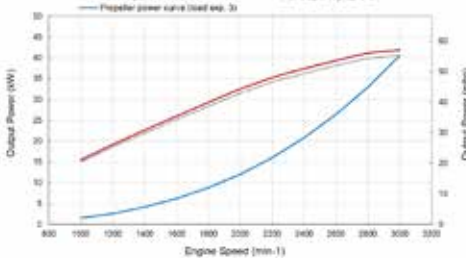
4JH45 Fuel consumption (propload exp 3.0)



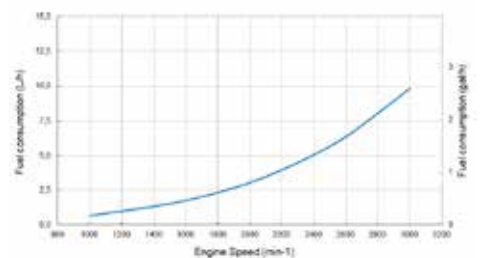
4JH57 Torque curve



4JH57 Output Power curve



4JH57 Fuel consumption (load exp. 3.0)



MARINE GEAR / DRIVE*

| Model | KM35P [parallel] | KM35A2 [down angle: 7°] | KM4A1 [down angle: 7°] | ZF30M [parallel] | Saildrive [SD60] |
|---|--|-------------------------|-------------------------------------|------------------------|--|
| Clutch type | Mechanical cone clutch | Mechanical cone clutch | Mechanical cone clutch | Mechanical multi-disc | Mechanical multi-disc |
| Dry weight | 15 kg [33 lbs] | 16 kg [35 lbs] | 33 kg [73 lbs] | 23 kg [51 lbs] | 44 kg [97 lbs] |
| Reduction ratio [fwd/asn] | 2.36/3.16 2.61/3.16 | 2.33/3.04 2.64/3.04 | 1.47/1.47 2.14/2.14 2.63/2.63 | 2.15/2.64 2.70/2.64 | 2.23/2.23 2.49/2.49 |
| Direction of rotation [viewed from stern] | Clockwise | Clockwise | Clockwise & counterclockwise | Clockwise | Clockwise & counter clockwise |
| Lubrication system | Splash lubrication | | | Trochoid pump | Splash lubrication |
| Lube oil specifications | API class: CD or higher, SAE grade: #20 or #30 | | | ATF | API class: CD or higher, SAE grade: 15W-40 |
| Max. lube oil capacity | 1.1 L | 0.65 L | 2.0 L | 1.1 L | 2.8 L |
| Dry weight - engine & gear | 235 kg [518 lbs] | 236 kg [520 lbs] | 253 kg [558 lbs] | 243 kg [536 lbs] | 264 kg [582 lbs] |

* Other marine gearboxes and configurations available upon request. Contact your local supplier for more information.

ACCESSORIES

Standard engine package

- Exhaust mixing elbow [L-type]
- Alternator 12V - 125A
- B25 panel
- Flexible mounts
- Mechanical throttle sensor
- Fuel pre-filter with water separator
- Fresh water expansion tank
- Belt safety cover

Optional

- High-riser mixing elbow [instead of L-elbow]
- Secondary alternator 12V - 125A or 24V - 60A
- C35 panel
- Extension harness [3m, 5m, 10m]
- Second station
- TFX Sidemount control head
- VC20 Vessel Control System
- NMEA2000 Engine monitoring system

- Semi 2-pole
- SOLAS including Certificate [factory fit only]
- Hot water kit with cocks
- Extension saildrive leg [75 mm]
- Propeller cone nut kit SD60
- On-board spare parts kit

NOTE: All data subject to change without notice. Text and illustrations are not binding.