

Fitted with a worm and wheel gear totally enclosed in an oil bath case, the Dando MK 500 incorporates a 150mm I.D. hollow spindle mounted on taper roller bearings. The head can then be powered by a single piston motor providing controlled rotation and torque in forward or reverse.



Piston motor arrangement.

With reference to our 24 tonne Rigs, Dando Drilling use a valve with a 140lt slice (i.e.70lt motor) and pressure at 315 bar (4568 PSI). Based on this and with a hydraulic piston motor you will see the following speed and torque:

20:1 Ratio

Maximum RPM 200 @ 3380 Nm (35cc/rev)
Maximum Torque 7725 Nm @ 87 RPM (80cc/rev)

15:1 Ratio

Maximum RPM 266 @ 2534 Nm (35cc/rev)
Maximum Torque 5793 Nm @ 116 RPM (80cc/rev)

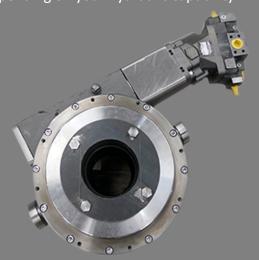
12 1/2:1 Ratio

Maximum RPM 319 @ 2112 Nm (35cc/rev)
Maximum Torque 4828 Nm @ 139 RPM (80cc/rev)

10:1 Ratio

Maximum RPM 400 @ 1690 Nm (35cc/rev)
Maximum Torque 3862 Nm @ 175 RPM (80cc/rev)

<u>Please note</u>- These are the results when fitted to a Dando type circuit and not the actual performance that the Rotary head and hydraulic motors are capable of. The piston motor can run with a pressure of 420 bar (6090PSI) and an RPM of 5000, therefore results will vary depending on your hydraulic capability



Single Gear motor arrangement

The torque advised below is a max because of the pressure limitation of the motor and the speed is based on 140 Lt.

10: 1 Ratio

Maximum RPM 190 @ 2305 Nm Maximum Torque 5028 Nm @ 50 RPM

12 1/2: 1 Ratio

Maximum RPM152 @ 2881 Nm Maximum Torque 6285 Nm @ 40 RPM

20: 1 Ratio

Maximum RPM 95 @ 4068 Nm Maximum Torque 9492 Nm @ 25 RPM

<u>Please note</u>- The 3" Gear motor is limited to 2500psi and is approximately 0.2245 Lt/rev. The motor is capable of 2000 RPM @ 365 Lt/min and performance can vary infinitely depending on the hydraulic supply system.

General Specifications

Estimated Shipping weight: 438kg

Gear Oil: 8 litres EP Gear Oil Grade 80/90

Hydraulic Oil: Shell Tellus 46 or equivalent

Maximum Pullback: 24 tons

Estimated shipping dimensions: 1m x 0.8m x .7m

