

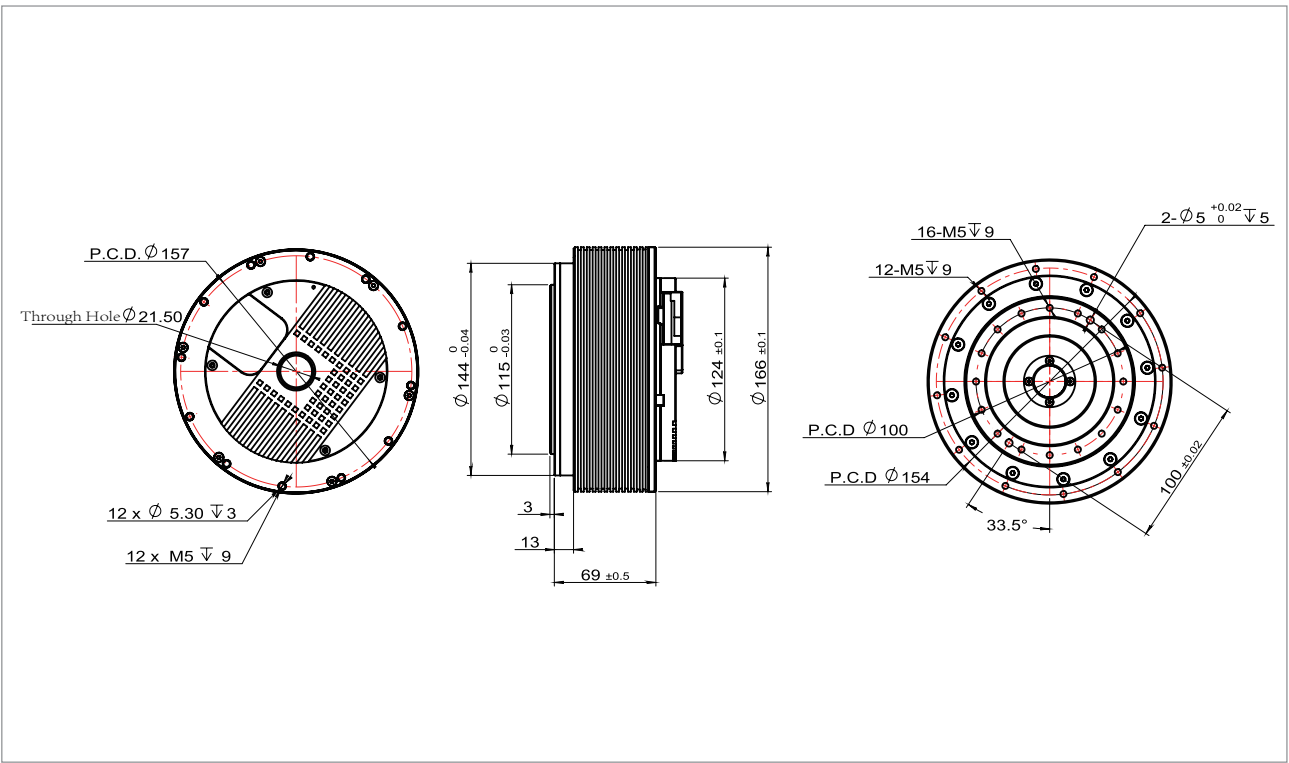
Series Name
RMD-X
Motor Simplified Name
X15-450



Dual encoder

Actuator Full Name	With Brake/Without Brake	Communication
RMD-X15-P20-450-E	N (without Brake)	EtherCAT & CAN BUS

Installation Drawing



Product Parameters

Parameters		Unit	X15-450
Gear Ratio		—	20.25
Input Voltage		V	72
Voltage Range		V	20-80
No Load Speed		RPM	108
No-Load Input Current		A	3.5
Rated Speed		RPM	98
Rated Torque		N.m	145
Rated Output Power		W	1480
Rated Phase Current		A(rms)	25
Peak Torque		N.m	450
Peak Phase Current		A(rms)	69.2
Efficiency		%	82.4
Motor Back-EMF Constant		Vdc/Krpm	29.9
Module Torque Constant		N.m/A	5.8
Line Resistance		Ω	0.08
Line Inductance		mH	0.14
Pole Pairs		—	20
3 Phase Connection		—	Y
Back Drive Torque		N.m	4
Backlash		Arcmin	≤15
Output Bearing Type		—	Crossed Roller Bearings
Axial Load	Tensile load	KN	5.4
	Compressive load	KN	5.4
Radial Load		KN	6
Inertia		Kg.cm²	31.6
Encoder Type & Interface		—	Dual Encoder ABS-17BIT (Input) / 17BIT (Output)
Control Accuracy		Degree	<0.01
Communication		—	EtherCAT & CAN BUS
Weight		Kg	3.50
Insulation Grade		—	F

Note:

- When the operating voltage exceeds the rated voltage, the operating speed must not exceed the motor's rated speed.
- When the operating voltage is lower than the rated voltage, the operating speed must be reduced proportionally. In this case, the rated torque remains constant, but the rated current will be slightly higher at the same torque level. Please refer to the characteristic curve for different voltages.

Stall Torque Data

	Torque (N.m)	Temperature Rise (°C)	Stall Time (s)	Phase Current (Arms)
X15-450	217.5	15	15	31.1
	290	15	10	41
	362.5	20	8	51.6
	435	25	5	67.2