

2-Phase Hybrid Stepping Motor

1.8°

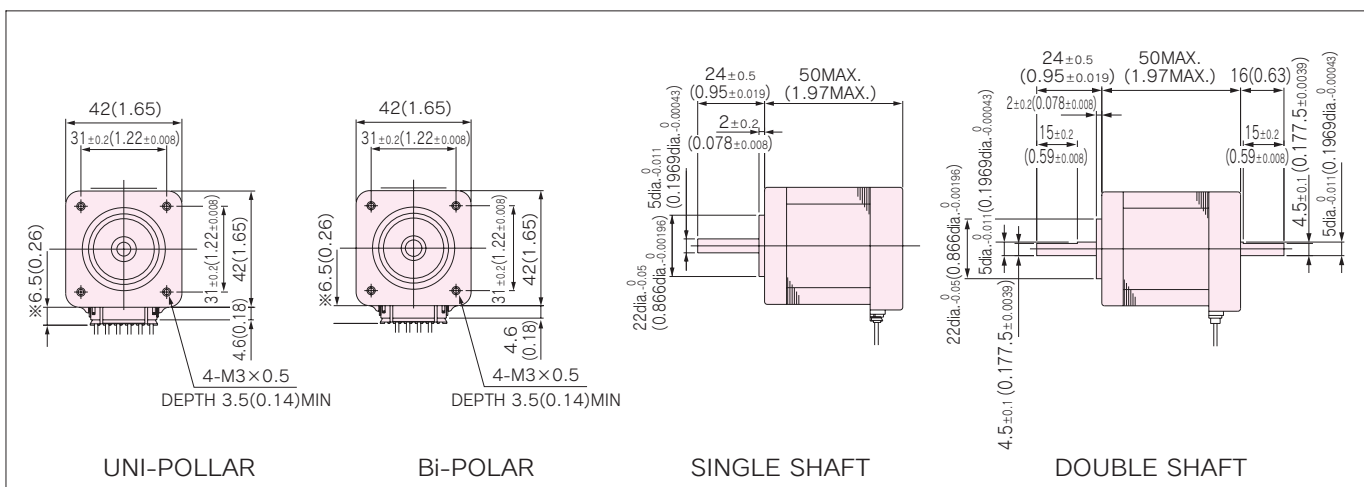
KH42series

HIGH TORQUE, LOW VIBRATION AND LOW NOISE

STANDARD SPECIFICATIONS

M O D E L		KH42KM2	
	SINGLE SHAFT	-901	-951
	DOUBLE SHAFT	-911	-961
DRIVE METHOD	—	UNI-POLAR	BI-POLAR
NUMBER OF PHASES	—	2	2
STEP ANGLE	deg./step	1.8	1.8
VOLTAGE	V	3.72	2.76
CURRENT	A/PHASE	1.2	1.2
WINDING RESISTANCE	Ω/PHASE	3.1	2.3
INDUCTANCE	mH/PHASE	3.1	4.0
HOLDING TORQUE	mN · m	340	403
	oz · in	48	57
DETENT TORQUE	mN · m	19.6	19.6
	oz · in	2.8	2.8
ROTOR INERTIA	g · cm ²	85	85
	oz · in ²	0.46	0.46
WEIGHTS	g	360	360
	lb	0.79	0.79
INSULATION CLASS	—	JIS Class E (120°C 248° F) (UL VALUE : CLASS B-130°C 266° F)	
INSULATION RESISTANCE	—	500VDC 100MΩmin.	
DIELECTRIC STRENGTH	—	500VAC 50HZ 1min.	
OPERATING TEMP. RANGE	°C	0 to 50	
ALLOWABLE TEMP. RISE	K	70	

DIMENSIONS unit = mm (inch)





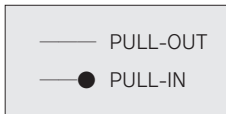
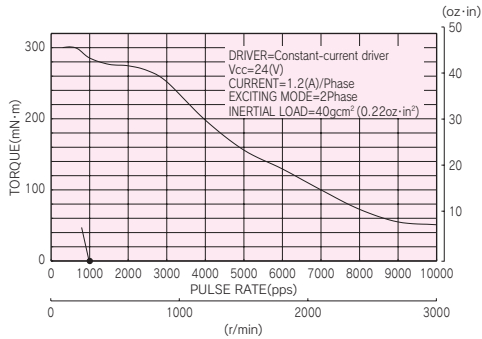
Features

- Improved Dynamic Torque
(1.2 times torque of our previous model is generated at 300 r/min, on model : KH42JM2-901)
- Lowered Vibration & Noise Level
(by increased stiffness of body construction)
- Improved Efficiency
(1.1 times of our previous model, by high grade materials.)

TORQUE CHARACTERISTICS vs. PULSE RATE

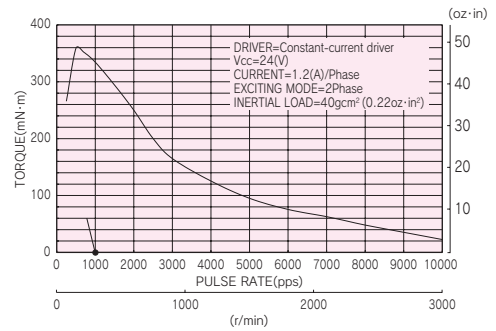
UNI-POLAR

KH42KM2-901, 911



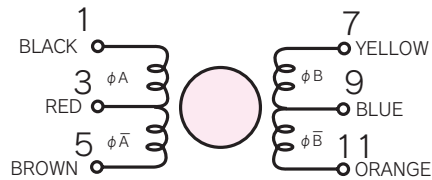
BI-POLAR

KH42KM2-951, 961



CONNECTION DIAGRAMS

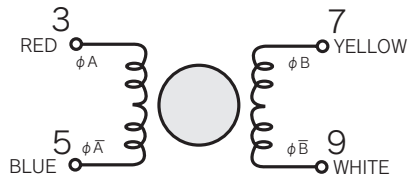
UNI-POLAR



EXCITATION SEQUENCE

STEP	1	2	3	4
BLACK(1)	-	-	-	-
YELLOW(7)	-	-	-	-
BROWN(5)	-	-	-	-
ORANGE(11)	-	-	-	-
RED(3)	+	+	+	+
BLUE(9)	+	+	+	+

BI-POLAR

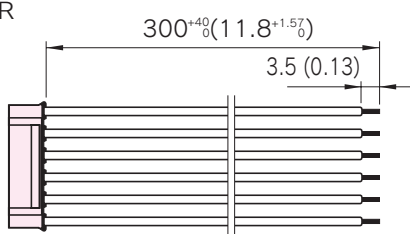


EXCITATION SEQUENCE

STEP	1	2	3	4
RED(3)	+	-	-	+
YELLOW(7)	+	+	-	-
BLUE(5)	-	+	+	-
WHITE(9)	-	-	+	+

CONNECTION CABLE TO MOTOR unit = mm (inch)

UNI-POLAR



BI-POLAR

