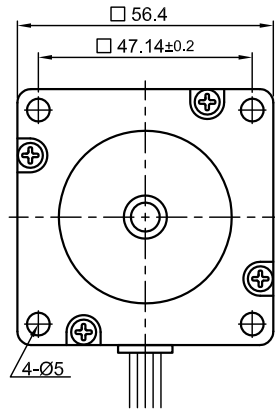
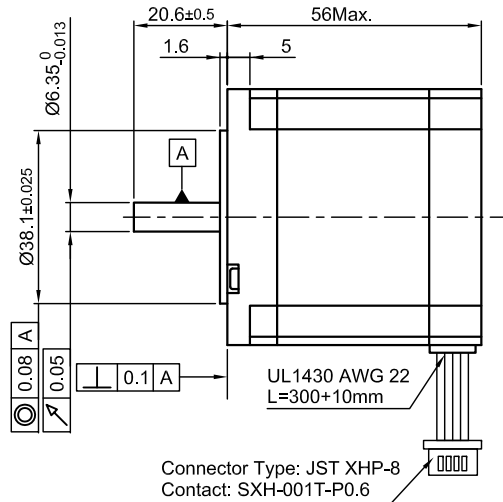


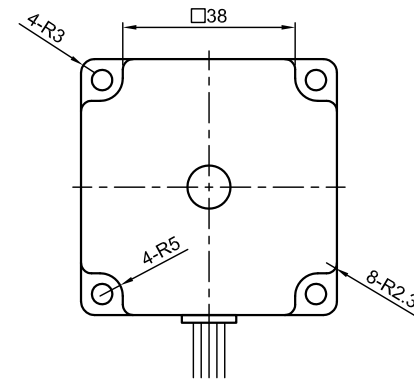
Front view and mounting



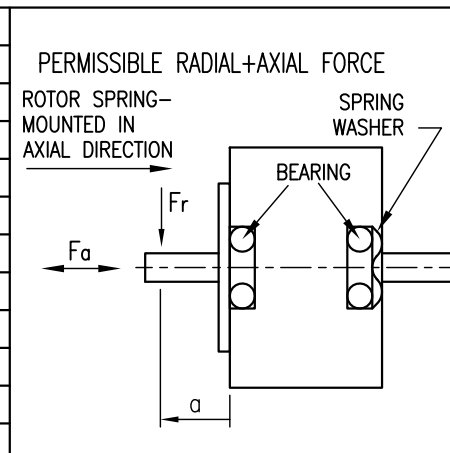
Side view



Rear view



SPECIFICATION	CONNECTION		BIPOLAR	
	UNIPOLAR OR BIPOLAR-1 WINDING		SERIAL	PARALLEL
VOLTAGE (VDC)	3.6			
AMPS/PHASE	2.0		1.41	2.82
RESISTANCE/PHASE (Ohms)@25°C	1.8±10%		3.6±10%	0.9±10%
INDUCTANCE/PHASE (mH) @1KHz	4.5±20%		18±20%	4.5±20%
HOLDING TORQUE (Nm) [lb-in]	0.74 [6.55]		1.05 [9.29]	1.05 [9.29]
DETENT TORQUE (Nm) [lb-in]	0.04 [0.354]			
STEP ANGLE (°) ± ACCURACY	0.9±5% (NON-ACCUM)			
BACK-EMF (V) (300 U/min)		23 min.		
ROTOR INERTIA (Kg-m ²) [lb-in ²]	3.0x10 ⁻⁵ [0.102]			
WEIGHT (Kg) [lb]	0.7 [1.54]			
TEMPERATURE RISE: MAX.80°C (MOTOR STANDSTILL; FOR 2 PHASE ENERGIZED)				
AMBIENT TEMPERATURE -10~ 50°C [14°F ~ 122°F]				
INSULATION RESISTANCE 100 MOhm (UNDER NORMAL TEMPERATURE AND HUMIDITY)				
INSULATION CLASS B 130° [266°F]				
DIELECTRIC STRENGTH 500VAC FOR 1 MIN. (BETWEEN THE MOTOR COILS AND THE MOTOR CASE)				
AMBIENT HUMIDITY MAX. 85% (NO CONDENSATION)				

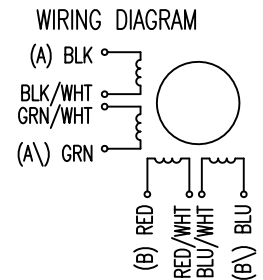


	PERMISSIBLE RADIAL+AXIAL FORCE			
	AXIAL-FORCE Fa (N)		F _a =15	
DISTANCE a (mm)	5	10	15	20
RADIAL-FORCE Fr (N)	130	90	70	52
		AXIAL	RADIAL	
SHAFT PLAY (mm)		0.08	0.02	
AT LOAD MAX: (N)		4.5	4.5	

TYPE OF CONNECTION (EXTERN)				MOTOR		
UNIPOLAR	BIPOLAR			CONNECTOR PIN NO.	LEADS	WINDING
	TWINDING	SERIAL	PARALLEL			
A	A	A	A	1	BLK	A
COM	A			3	BLK/WHT	
A\		A\	A\	2	GRN/WHT	A\
B	B	B	B	4	GRN	B
COM	B			5	RED	
B\		B\	B\	7	RED/WHT	B\
				6	BLU/WHT	
				8	BLU	

FULL STEP 2 PHASE-Ex., WHEN FACING MOUNTING END (X)

STEP	A	B	A\	B\	CCW	CW
1	+	+	-	-	↓	↑
2	-	+	+	-	↓	↑
3	-	-	+	+	↓	↑
4	+	-	-	+	↓	↑



				 Nanotec [®] PLUG & DRIVE	SCALE FREE	APVD	M.S.	21.04.11	STEPPING MOTOR DWG.NO ST5909M2008-A
REV	DESCRIPTION	DATE	APVD		X ±0.5	CHKD			
				1PL ±0.2	DRN	J.W.	21.04.11		
				2PL ±0.1	SIGNATURE		DATE		
				ANGLE ±30'					