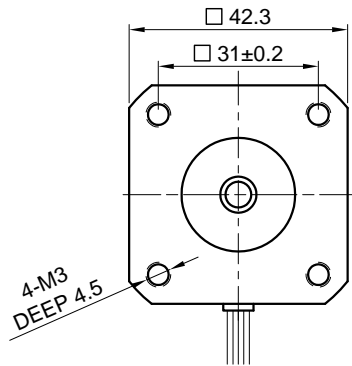
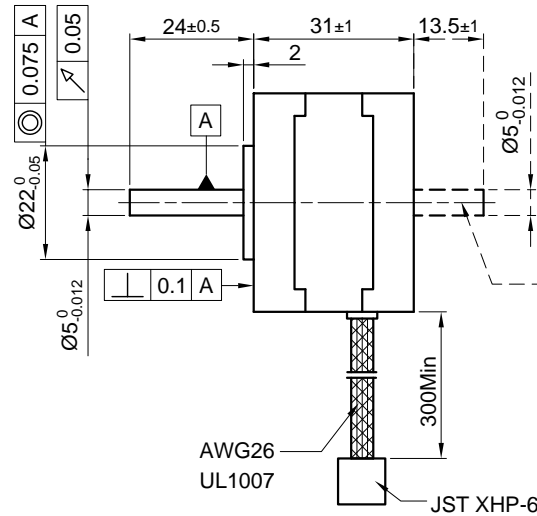


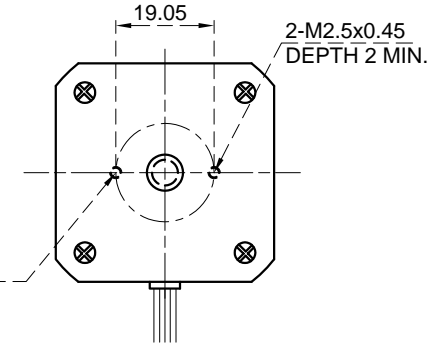
Front view and mounting



Side view



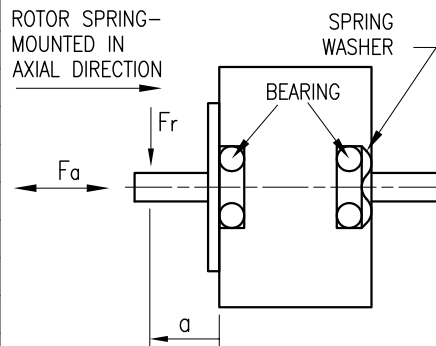
Rear view



(only for type ST4118S0206-B Ready for encoder + driver mount)

| SPECIFICATION | CONNECTION | UNIPOLAR OR BIPOLAR-1 WINDING | BIPOLAR SERIAL |
|--|------------|--|----------------|
| VOLTAGE (VDC) | | 16.5 | 24.0 |
| AMPS/PHASE | | 0.22 | 0.16 |
| RESISTANCE/PHASE (Ohms)@25°C | | 75±15% | 150±15% |
| INDUCTANCE/PHASE (mH) @1KHz | | 53±20% | 212±20% |
| HOLDING TORQUE (Nm) [lb-in] | | 0.15 [1.328] | 0.212 [1.876] |
| DETENT TORQUE (Nm) [lb-in] | | 5.9x10 ⁻³ [5.222x10 ⁻²] | |
| STEP ANGLE (°) | | 1.8 | |
| STEP ACCURACY (NON-ACCUM) | | ±5% | |
| ROTOR INERTIA (Kg-m ²) [lb-in ²] | | 3.8x10 ⁻⁶ [1.3x10 ⁻²] | |
| WEIGHT (Kg) [lb] | | 0.2 [0.44] | |
| 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



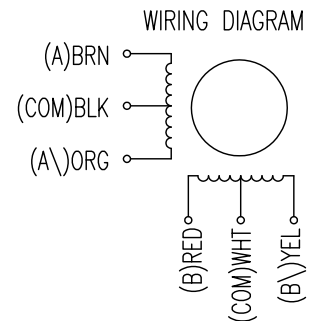
| AXIAL-FORCE Fa (N) | Fa=7 | | | |
|---------------------|-------|--------|----|----|
| DISTANCE a (mm) | 5 | 10 | 15 | 20 |
| RADIAL-FORCE Fr (N) | 58 | 36 | 26 | 20 |
| | AXIAL | RADIAL | | |
| SHAFT PLAY (mm) | 0.08 | 0.02 | | |
| AT LOAD MAX: (N) | 4.5 | 4.5 | | |

| UNIPOLAR | TYPE OF CONNECTION (EXTERN) | | MOTOR | | |
|----------|-----------------------------|--------|-------------------|-------|---------|
| | 1WINDING | SERIAL | CONNECTOR PIN NO. | LEADS | WINDING |
| A | A | A | 1 | BRN | A |
| COM | COM | | 5 | BLK | COM |
| A\ | | A\ | 3 | ORG | A\ |
| B | B | B | 2 | RED | B |
| COM | COM | | 6 | WHT | COM |
| B\ | | B\ | 4 | YEL | B\ |

for >speed ←
for <speed ←

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

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



| REV | DESCRIPTION | DATE | APVD | NANOTEC: | SCALE | FREE | APVD | S.H.a. | 26.02.07 | STEPPING MOTOR |
|-----|-------------|------|------|----------|-------|------|------|-----------|----------|----------------|
| | | | | | X | ±0.5 | | CHKD | | |
| | | | | | 1PL | ±0.2 | | DRN | J.W. | 29.11.06 |
| | | | | | 2PL | ±0.1 | | | | DWG.NO |
| | | | | | ANGLE | ±30' | | SIGNATURE | DATE | ST4118S0206 |