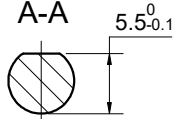
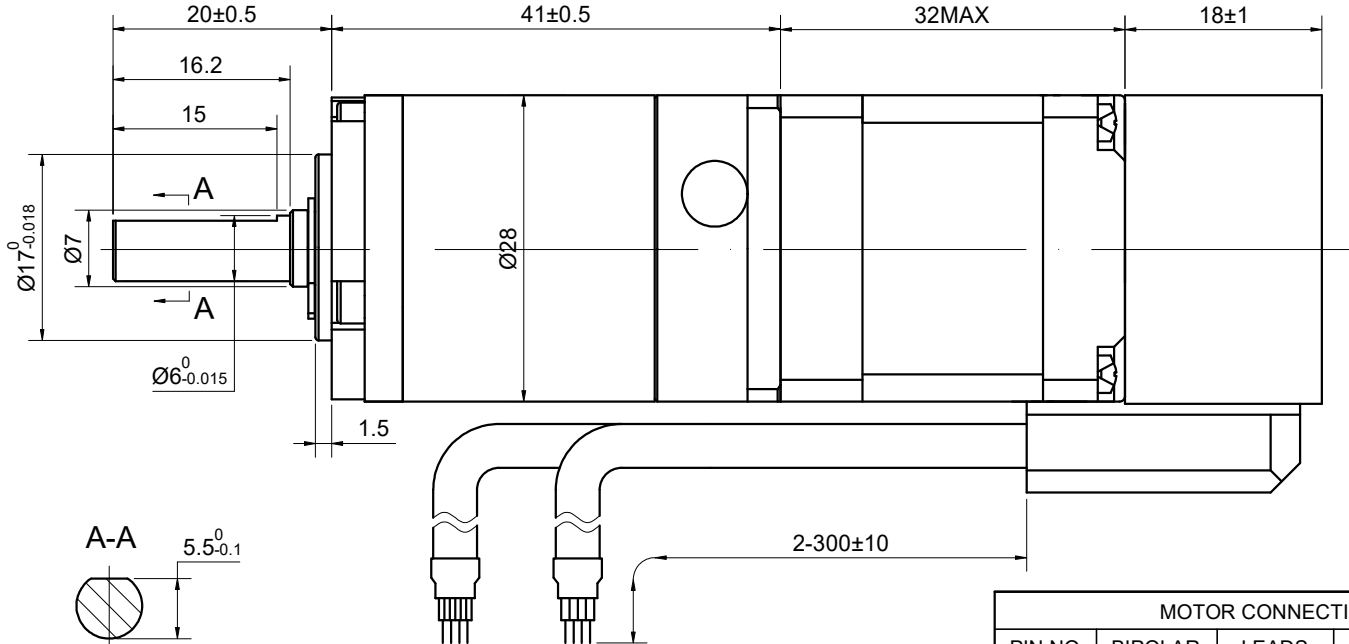
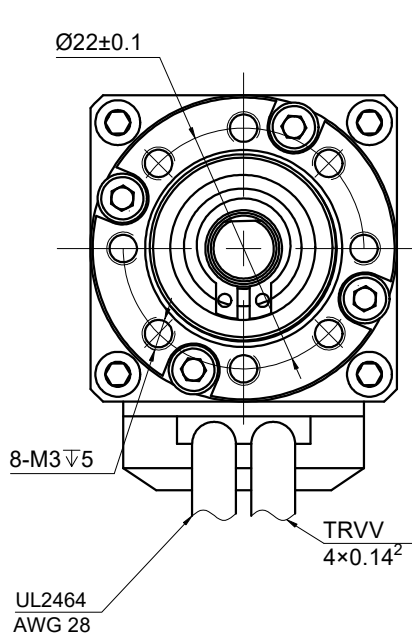


| REV. | REVISION RECORD | BY | DATE |
|------|-----------------|-----|-----------|
| 0 | ORIGIN | ZPJ | 3.23.2026 |

CUSTOMER'S MODEL: NO MODEL
 END COVER COLOR: BLACK



STEPPER MOTOR
 11HS12-1004D-E1000-EGS20
 S/N: XXXXXXXXXXXXX



| MOTOR CONNECTION | | | |
|------------------|---------|-------|---------|
| PIN NO | BIPOLAR | LEADS | WINDING |
| 1 | A+ | BLK | |
| 2 | A- | GRN | |
| 3 | B+ | RED | |
| 4 | B- | BLU | |

| SPECIFICATION | CONNECTION | BIPOLAR |
|---------------------------------------|------------|------------------------|
| AMPS/PHASE | | 1.00 |
| RESISTANCE/PHASE(Ohms)@25°C | | 2.00±10% |
| INDUCTANCE/PHASE(mH)@1KHz | | 1.50±20% |
| HOLDING TORQUE w/o GEARBOX(Nm)[lb-in] | | 0.06[0.53] |
| STEP ANGLE w/o GEARBOX(°) | | 1.80 |
| GEAR RATIO | | 20 |
| GEAR EFFICIENCY | | 94% |
| BACKLASH@NO-LOAD | | <=20 arcmin |
| MAX.PERMISSIBLE TORQUE(Nm) | | 4.00 |
| MOMENT PERMISSIBLE TORQUE(Nm) | | 8.00 |
| AMBIENT TEMPERATURE | | -10°C~50°C[14°F~122°F] |
| INSULATION CLASS | | B 130°C[266°F] |
| TEMPERATURE RISE | | MAX.80°C |

COMMENT:
 1.DYNAMIC AXIAL LOAD: 100N MAX
 2.DYNAMIC RADIAL LOAD: 300N MAX
 3.TMBF 6000h OR MORE @ 24V/300RPM
 4.INSULATION RESISTANCE (NORMAL TEMPERATURE AND HUMIDITY): 100 Mohm
 5.DIELECTRIC STRENGTH 500VAC FOR 1MIN.(BETWEEN THE MOTOR COILS AND THE MOTOR CASE)

| ENCODER RESOLUTION:1000PPR(4000CPR) | | | | | | | | |
|-------------------------------------|-----|-----|-----|-----|-----|-----|-----|-----|
| LEAD COLOR | RED | BLK | WHT | YEL | ORG | GRA | GRN | BLU |
| DESCRIPTION | VCC | GND | EA+ | EA- | EB+ | EB- | EZ+ | EZ- |

| FULL STEP 2 PHASE-Ex.,WHEN FACING MOUNTING END (X) | | | | | CCW | CW |
|--|----|----|----|----|-----|----|
| STEP | A+ | B+ | A- | B- | | |
| 1 | + | + | - | - | | |
| 2 | - | + | + | - | | |
| 3 | - | - | + | + | | |
| 4 | + | - | - | + | | |

DIMENSIONS ARE IN MILLIMETERS.
 TOLERANCES AS BELOW:
 DECIMALS ANGLES
 X ±0.5 ±2°
 X.X ±0.25
 X.XX ±0.13

THIRD ANGLE PROJECTION

STEPPERONLINE®

GEARED STEPPER MOTOR

11HS12-1004D-E1000-EGS20

THIS DOCUMENT SHALL NOT BE REPRODUCED NOR SHALL THE INFORMATION CONTAINED HEREIN BE USED BY OR DISCLOSED TO OTHERS UNLESS EXPRESSLY AUTHORIZED IN BY WRITING STEPPERONLINE.

| SIGNATURE | | DATE |
|-----------|-----|-----------|
| DRN | ZPJ | 3.23.2026 |
| APVD | LDJ | 3.23.2026 |