

# VERTICAL HOLLOW SHAFT TEFC HIGH THRUST with "P" BASE - MEDIUM VOLTAGE



AEHCNH, NEMA PREMIUM [VHKTP]

Effective 07-08-18  
Supercedes 03-24-17



## APPLICATIONS:

- Deep Well Turbine Pumps
- Irrigation
- Water/Wastewater

## FEATURES:

- Output Range: 200 - 700 HP
- Speed: 1800 & 1200 RPM
- Enclosure: Totally Enclosed Fan Cooled (IP54)
- Voltage: 2300/4000V
- Motors Suitable for Reduced Starting Voltage
- Three Phase, 60 Hz, 1.15 Service Factor (Continuous on Sine Wave Power)
- Inverter Duty (PWM) per NEMA® MG-1 Part 31 at 1.0 Service Factor
- Standard Features: Coupling w/ Gib Key, Non-Sparking Ball Type NRR, Drip/Splash Cover, Space Heaters (120V)
- 5000 Frames and Above also include Mounting Provisions for bearing RTD's and Insulated Bearing Housing
- CSA Certified for Class I, Div. 2, Groups B,C, D; Temp Code T3 minimum
- Class F Insulation with VPI Epoxy Resin Varnish
- Class B Temperature Rise
- NEMA Design B Torques
- Oversized Main Conduit Box Rotatable in 90 Degree Increments - Fully Gasketed with NPT Threaded Entrance
- Steel Plate Conduit Box with Threaded Connection Opening(s)
- Designed for 40°C Ambient Temperature<sup>(1)</sup>
- Designed for 3300 ft. Elevation<sup>(2)</sup>
- Oversized Angular Contact or Spherical Thrust Bearing Installed
- Counterclockwise (CCW) Rotation; Viewed from Top
- Cast Iron Frame & End Brackets
- 1045 Hollow Carbon Steel Shaft
- Aluminum Die Cast Squirrel Cage Rotor Construction for F#449TP
- Squirrel Cage Copper or Copper Alloy Bar Rotor Construction for F#5000 and Above
- Paint System: Phenolic Rust Proof Base Plus Polyurethane Top Coat
- Paint Color: Blue - Munsell 5PB 3/8
- Vacuum De-Gassed Re-Greasable Ball Bearings Frames -5007TP & Up with Mobil Polyrex™ EM Grease
- Guide Bearings: 324TP - 5810P Frames are Re-Greasable with Mobil Polyrex™ EM Grease
- Thrust Bearings: 449 - 5810P Frames are Oil Lubricated Angular Contact or Spherical Thrust Bearing with Site Glass
- Oil Requirements for 444TP - 5810P Frames: 300 S.S.U. @ 100°F
- Grease Discharge Fittings on Frames with Re-Greasable Motors
- Bronze Labyrinth Type Metal Flinger on Lower End Bracket
- Grounding Terminal Inside Main Box
- Stainless Steel Nameplate
- Suitable for Inverter Use per NEMA MG-1.4.4.2, Part 31.
- Speed Ranges: 10:1 Variable Torque
- 6 Leads
- UL Recognized and CSA Approved
- Precautions should be taken to eliminate or reduce shaft currents that may be imposed on the motor by VFD as stated per NEMA MG-1. Part 31.
- Ball Type NRR Provided

## EXTRAS/ OPTIONS:

Please refer to the modifications document for common modifications that can be performed.

### Notes:

- (1) Consult a Stock Product Application Specialist for suitability in higher ambient environments.
- (2) Consult a Stock Product Application Specialist for suitability at higher elevations.