

UNITS: INCHES

FRAME SIZE	MOTOR DIMENSIONS											CONDUIT BOX DIMENSIONS						
	A	B	C	D	G	J	K	M	O	P	T	AA(NPT)	AB	AC	AE	AF	XL	XN
N447TS/N449TS	22.0	36.6	56.5	11.00	1.4	4.5	14.6	22.4	24.8	27.3	3.2	3.00	27.0	21	11.00	7.2	15.3	14.7
N447T/N449T	22.0	36.6	60.3	11.00	1.4	4.5	14.6	22.4	24.8	27.3	3.2	3.00	27.0	21	11.00	7.2	15.3	14.7

FRAME SIZE	MOUNTING				SHAFT EXTENSION			KEY SEAT			BEARINGS					MAXIMUM WEIGHT
	E	2F	H	BA	N-W	V	U	R	S	ES	LS 2P	OS 2P	LS ROLLER 4~8P	LS BALL 4~8P	OS 4~8P	
N447TS/N449TS	9.00	20.00/25.00	0.81	7.50	4.75	4.50	2.375	2.021	0.625	3.03	6313C3	6313C3	—	6318C3	6318C3	4200 lbs
N447T/N449T	9.00	20.00/25.00	0.81	7.50	8.50	8.25	3.375	2.88	0.875	6.91	—	—	NU318C3	6318C3	6318C3	4200 lbs

NOTES:

- DIMENSION V REPRESENTS LENGTH OF STRAIGHT PART OF SHAFT.
- MAIN CONDUIT BOX MAY BE ROTATED IN 90° INCREMENTS.
- KEY DIMENSIONS EQUAL S x S x 6.88 FOR 'T' AND S x S x 3.00 FOR 'TS' (MOTOR SUPPLIED WITH KEY).
- MOTOR WEIGHT SHOWN IS MAXIMUM HORSEPOWER IN FRAME.
- STANDARD 2 POLE PRODUCT USE UNI-DIRECTIONAL FAN. OPPOSITE ROTATION AVAILABLE ONLY BY FAN AND CONNECTION CHANGE.
- STANDARD 4~8 POLE PRODUCT USE BI-DIRECTIONAL FAN. OPPOSITE ROTATION AVAILABLE ONLY BY CONNECTION CHANGE.
- THIS DIMENSION EQUALS 2F FOR N447 MOUNTING

CUSTOMER: _____ MOTOR MODEL NO.: _____

P.O. NO.: _____ HP: _____ VOLTAGE: _____ RPM(SYN.): _____ Hz: _____

FRAME SIZE: _____ PRODUCT TYPE: TEFC EXPLOSION PROOF; CLASS I GROUP D; CLASS II GROUPS E, F, G

COMMENTS: _____

PER: _____ DATE: _____

TAG NO's: _____

- ☒ STANDARD (NO AUX. BOXES)
- ☐ RTD AUX. BOX
- ☐ SPACE HEATER AUX. BOX
- ☐ BEARING RTD's

TOSHIBA RESERVES THE RIGHT TO MAKE CHANGES OF TECHNICAL IMPROVEMENT AND THE DATA MAY CHANGE WITHOUT NOTICE ☒ PRELIMINARY

DO NOT USE FOR CONSTRUCTION, INSTALLATION, OR APPLICATION PURPOSES UNLESS THE DRAWING IS MARKED AS CERTIFIED ☐ CERTIFIED

TOSHIBA

TOSHIBA INTERNATIONAL CORPORATION

TOTALLY-ENCLOSED FAN-COOLED
HORIZONTAL FOOT-MOUNTED
3 PHASE INDUCTION MOTOR
F1 ASSEMBLY

XT SERIES

VISIT OUR WEBSITE AT:
www.toshiba.com/ind

TYPICAL MOTOR PERFORMANCE DATA

Model: 2506XPEB41A-R

HP	kW	Pole	FL RPM	Frame	Voltage	Hz	Phase	FL Amps
250	186	6	1188	N449T	460	60	3	309
Enclosure	IP	Ins. Class	S.F.	Duty	NEMA Nom. Eff.	NEMA Design	kVA Code	Ambient (°C)
TEFC	55	F	1.15	CONT	95.8	B		40 C

Load	HP	kW	Amperes	Efficiency (%)	Power Factor (%)
Full Load	250.00	186.4	308	96.0	79.0
¾ Load	187.50	139.8	242	95.3	75.9
½ Load	125.00	93.2	184	93.7	67.9
¼ Load	62.50	46.6	138	88.5	47.8
No Load			113.6		
Locked Rotor			1768		

Torque				Rotor wk² Inertia (lb-ft²)
Full Load (lb-ft)	Locked Rotor (% FLT)	Pull Up (% FLT)	Break Down (% FLT)	
1105	165	125	225	159.00

Safe Stall Time(s)		Sound Pressure dB(A) @ 1M	Bearings*		Approx. Motor Weight (lbs)
Cold	Hot		DE	NDE	
33	15	-	NU318C3	6318C3	4000

*Bearings are the only recommended spare part(s).

Motor Options:
Product Family:EQP Global Explosion Proof
Mounting:Footed,Shaft:T Shaft

Customer	
Customer PO	
Sales Order	
Project #	

Tag:

All characteristics are average expected values.

TOSHIBA INTERNATIONAL CORPORATION · HOUSTON, TEXAS U.S.A.

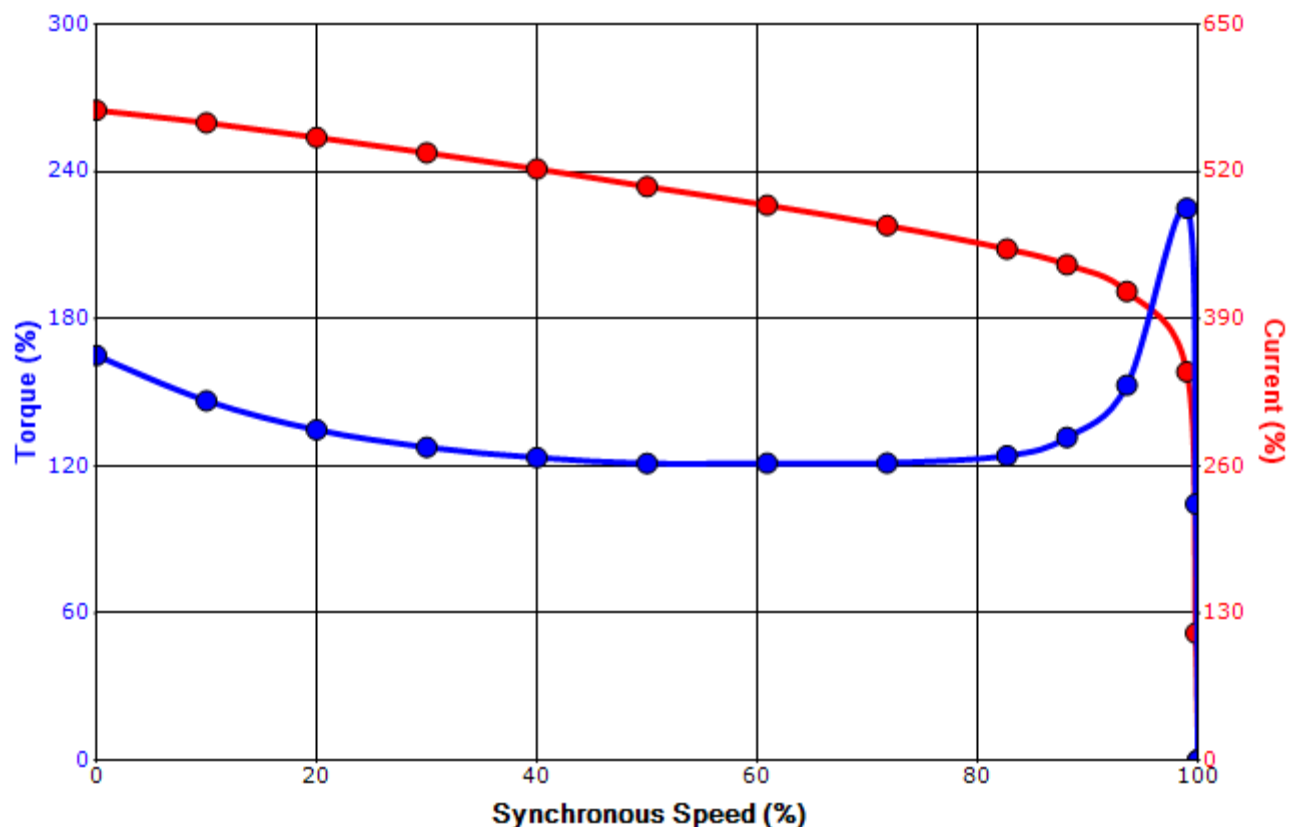
Engineering	zxie	Doc. Written By	D. Suarez	Doc.# / Rev	MPCF-1119 / 0
Engr. Date	1/13/2022	Doc. Approved By	M. Campbell	Doc. Issued	6/8/2011

SPEED TORQUE/CURRENT CURVE

Model: 2506XPEB41A-R

HP	kW	Pole	FL RPM	Frame	Voltage	Hz	Phase	FL Amps
250	186	6	1188	N449T	460	60	3	309
Enclosure	IP	Ins. Class	S.F.	Duty	NEMA Nom. Eff.	NEMA Design	kVA Code	Ambient (°C)
TEFC	55	F	1.15	CONT	95.8	B		40 C
Locked Rotor Amps	Rotor wk ² Inertia (lb-ft ²)	Torque						
		Full Load (lb-ft)	Locked Rotor (%)	Pull Up (%)		Break Down (%)		
1768	159.00	1105	165	125		225		

Design Values



Customer			wk ² Load Inertia (lb-ft ²)	-
Customer PO			Load Type	-
Sales Order			Voltage (%)	100
Project #			Accel. Time	-

Tag:

All characteristics are average expected values.

TOSHIBA INTERNATIONAL CORPORATION · HOUSTON, TEXAS U.S.A.

Engineering	zxie	Doc. Written By	D. Suarez	Doc.# / Rev	MPCF-1121 / 0
Engr. Date	1/13/2022	Doc. Approved By	M. Campbell	Doc. Issued	6/8/2011

Motor Connection Diagrams
6 Leads

Across the Line Starting / Run - Delta:



Alternate Starting Connection - Wye:



Switch L1 and L2 to reverse rotation

SPARE PARTS LIST*

Model: 2506XPEB41A-R

HP	kW	Pole	FL RPM	Frame	Voltage	Hz	Phase	FL Amps
250	186	6	1188	N449T	460	60	3	309
Enclosure	IP	Ins. Class	S.F.	Duty	NEMA Nom. Eff.	NEMA Design	kVA Code	Ambient (°C)
TEFC	55	F	1.15	CONT	95.8	B		40 C

Bearings DE	NU318C3 / 90RU03M3OX
Bearings NDE	6318C3 / 90BC03J3OX

*Bearings are the only recommended spare part(s).

Other than the grease used for regreasable bearings and the oil used for oil-lubricated bearings, Toshiba advises that there are no "use" parts. The only insurance spares that Toshiba suggests for these squirrel-cage induction motors are industry-standard and commercially available off-the-shelf bearings as noted above.

Motor components such as terminal boxes, fan covers and other machined parts are available on special request. In these cases, please advise our order entry department of the model and serial numbers found on the motor nameplate and a description of the needed components. With this information they will be able to furnish the current part number, price and availability.

Note: Our internal part numbers are subject to change without notice and are not published.

Customer		
Customer PO		
Sales Order		
Project #		

Tag:

All characteristics are average expected values.

TOSHIBA INTERNATIONAL CORPORATION · HOUSTON, TEXAS U.S.A.

Engineering	zxle	Doc. Written By	D. Suarez	Doc.# / Rev	MPCF-1125 / 0
Engr. Date	1/13/2022	Doc. Approved By	M. Campbell	Doc. Issued	6/8/2011