

Technical Documentation

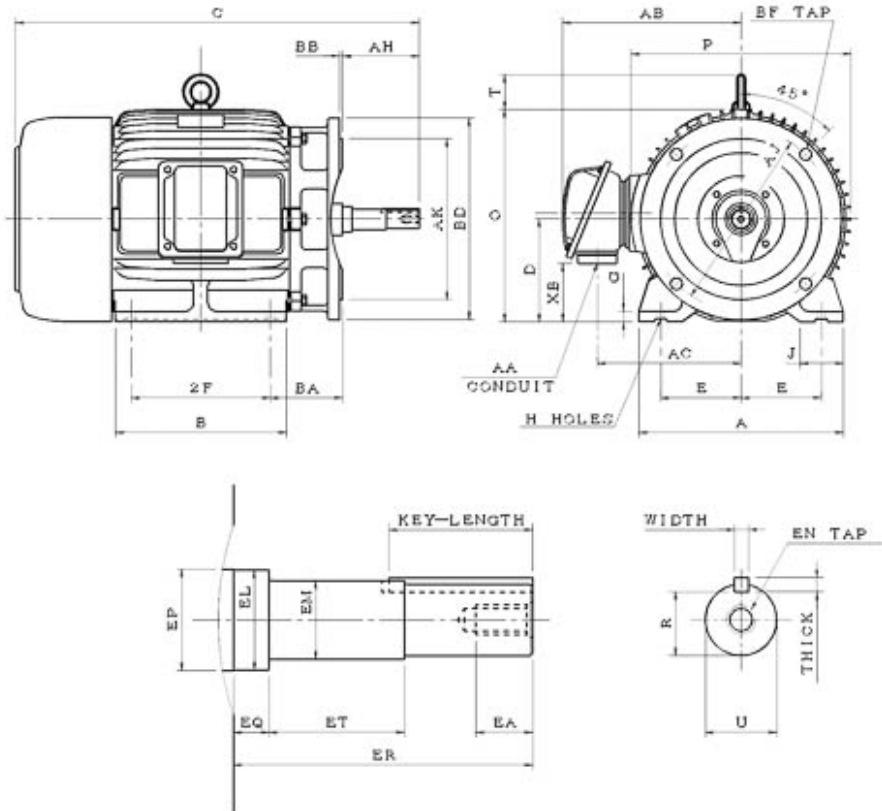
CJP0304

Optim JP | AEHH8N_JP

Date: April 15, 2021

Dimensional Drawing

Catalogue	Model	HP	Pole	kW	Rating	Voltage	Hz	RPM
CJP0304	AEHH8N_JP	30	4	22.38	Continuous	230 / 460	60	1800



AEHH8N-JP-SMP-5

Frame Size		Mounting					A	B	C	CD	D
		E	2F	2F2	H	BA					
286JP		5.5	11		0.53	4.95	13.98	12.8	32.005		7

G	J	K	L	M	O	P	T	Key			Keyseat
								Width	Thick	Length	R
0.7	2.95				14.5	15.04	2.36	0.25	0.25	2.52	1.112

Terminal Housing				Aux Box		C/D Flange					
AA	AB	AC	XB	AE	AX	BB	AH	AK	BD	AJ	BF
11/2"	12.28	9.84	3.97			0.2	8.125	12.5	13.78	11	4-5/8"-11UNC

Shaft Extension			Bearings		Approx. Weight Lbs	SPL dBA/3ft	Ins. Class	S.F.	Drive Method	Dimensions
N-W	U	V	DE	NDE						
	1.25		6311ZZ	6310ZZ	517	70.0	F	1.15	DirectCoupling	Inches

	
	Date: April 15, 2021

Technical Data Sheet

Motor Type: AEHH8N_JP	Catalogue No: CJP0304
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Nameplate Information

HP	Pole	RPM	Frame	Voltage	Hz	Phase
30	4	1770	286JP	230 / 460	60	3
Enclosure	Ins. Class	Service Factor	Time Rating	NEMA Design	Rated Amb.	Rated Altitude
TEFC	F	1.15	Continuous	B	-40 to 40°C °C	<1000 m

Typical Performance

Efficiency (%)				Power Factor (%)		
Full Load		3/4 Load	1/2 Load	Full Load	3/4 Load	1/2 Load
Nom.	Min.					
93.60	92.40	93.60	93.60	87.50	85.50	79.50
Torque				Current (A)		
Full Load (lb-ft)	Locked Rotor (% FLT)	Pull Up (% FLT)	Break Down (% FLT)	No Load	Full Load	Locked Rotor
88.99	200	160	235	17.5 / 8.8	68.6 / 34.3	436.00 / 218.00
NEMA KVA Code	Inertia (WR ²)			Safe Stall Time (s)		Noise Level Sound Press. dB(A)
	Rotor (lb-ft ²)	NEMA Load (lb-ft ²)	Max. Allowable (lb-ft ²)	Cold	Hot	
G	5.274	144.00	328.00	25	18	70.0

VFD Duty Information

Speed Range			VFD		S.F.
Constant Torque	Variable Torque	Constant Power	Carrier	Type	
6-60Hz	3-60Hz	60-90Hz	0	VPWM or CPWM	1.0 Only

Hazardous Locations Information

Additional Certifications

CSA Certified	Other Certification
Class I, Div 2, Groups B, C & D Class I, Zone 2, Groups IIB+H2, IIB & IIA	
Temp Code (Sinewave / VFD)	T3C / T3B

Additional Information

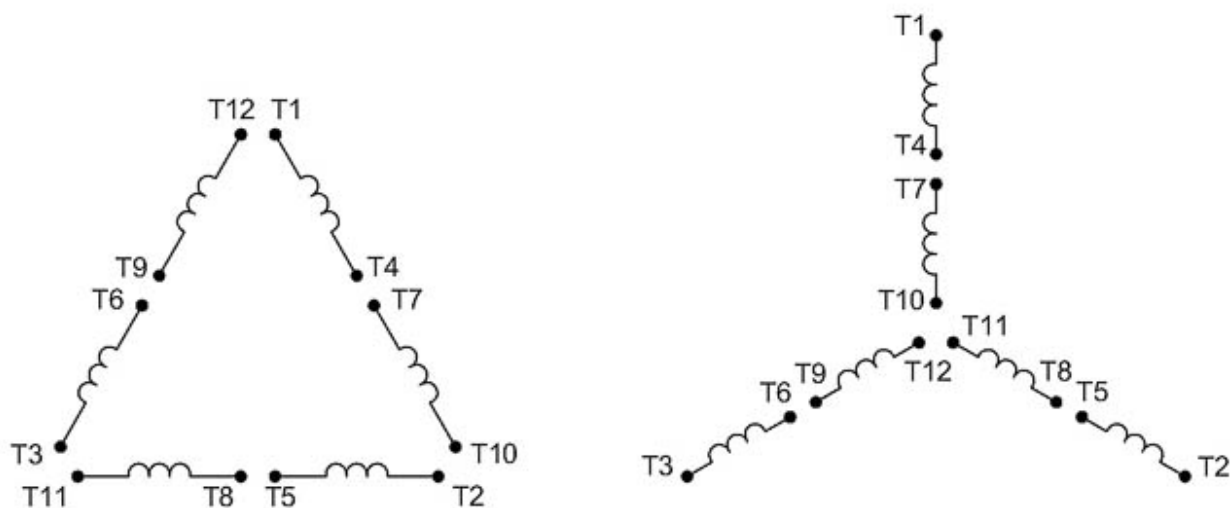
Bearings		Approx. Weight
DE	NDE	lbs
6311ZZ	6310ZZ	517

Nameplate Drawing

Optim JP

TYPE	AEHH8N JP	CAT. NO.	CJP0304		
OUTPUT	30 HP 22.38 kW	FRAME	286JP	TEFC	
R.P.M.	1770	POLE	4	INS.	F
VOLTS	230 / 460	PHASE	3	Hz	60
AMPS	68.6 / 34.3	CODE	G	S.F.	1.15
AMBIENT	40 °C	NOM. EFF. 93.60		MIN. EFF. 92.40	
BEARINGS	6311ZZ / 6310ZZ			RATING Cont.	
SER. NO.	TBD		DESIGN	B	WT. 517 LBS
PWM VFD DUTY	VT	CT	CP	S.F.	
	3-60Hz	6-60Hz	60-90Hz	1.0 Only	

Connection Diagram

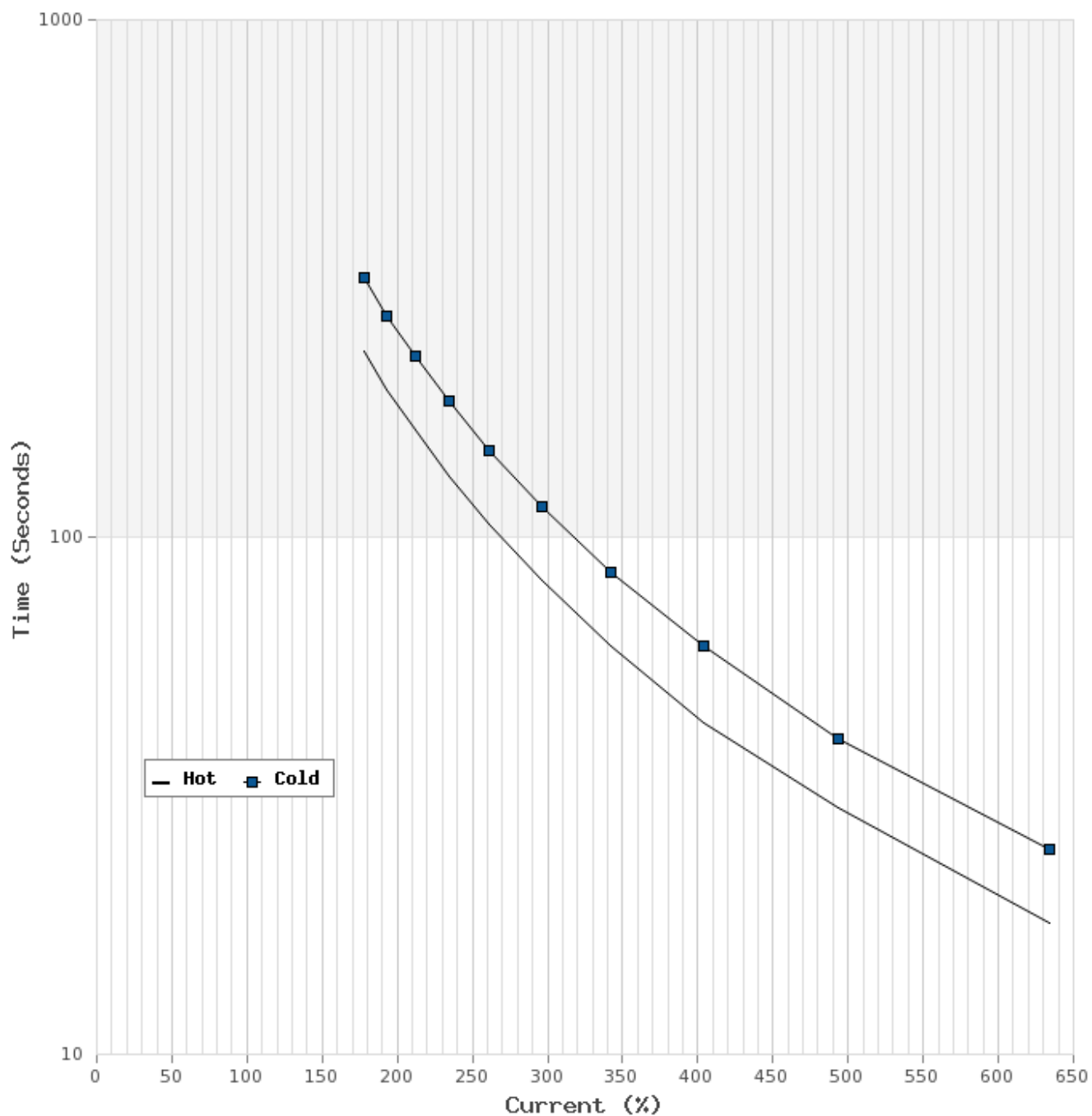


12 LEAD		DUAL VOLTAGE		WYE/DELTA		
VOLTAGE	CONNECTION		L1	L2	L3	JOIN
HIGH	START	WYE	1	2	3	4&7,5&8,6&9 10&11&12
	RUN	DELTA	1,12	2,10	3,11	4&7,5&8,6&9
LOW	START	2 WYE	1,7	2,8	3,9	4&5&6 10&11&12
	RUN	2 DELTA	1,6,7 12	2,4,8 10	3,5,9 11	

WD_12YD

Thermal Limit Curves

Motor Type: AEHH8N JP		Catalogue No: CJP0304		Family: Optim JP	
HP	30	Safe Stall Time		Full Load A	68.6 / 34.3 A
Voltage	230 / 460V 60Hz	Hot	18 s	% Inrush	636 / 636 %
RPM	1800	Cold	25 s	Locked Rotor A	436.00 / 218.00 A



T-N and I-N Curves

Motor Type: AEHH8N JP		Catalogue No: CJP0304		Family: Optim JP	
HP	30	Full Load T	88.99 lb-ft	Full Load A	68.6 / 34.3 A
Voltage	230 / 460V 60Hz	Locked Rotor T	200 %	Locked Rotor A	436.0 / 218.0 A
RPM	1800	Pull Up T	160 %	Break Down T	235 %

