

Technical Documentation

CJM0024

Optim JM | AEHH8N_JM

Date: April 15, 2021

	
	Date: April 15, 2021

Technical Data Sheet

Motor Type: AEHH8N _{JM}	Catalogue No: CJM0024
----------------------------------	-----------------------

Nameplate Information

HP	Pole	RPM	Frame	Voltage	Hz	Phase
2	4	1740	145JM	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.					
86.50	84.00	84.00	84.00	78.00	70.00	57.00
Torque				Current (A)		
Full Load (lb-ft)	Locked Rotor (% FLT)	Pull Up (% FLT)	Break Down (% FLT)	No Load	Full Load	Locked Rotor
6.04	270	220	330	2.9 / 1.5	5.6 / 2.8	50.00 / 25.00
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	
L	0.108	11.00	51.00	43	30	51.0

VFD Duty Information

Speed Range			VFD		S.F.
Constant Torque	Variable Torque	Constant Power	Carrier	Type	
6-60Hz	3-60Hz	60-120Hz	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 / T3C

Additional Information

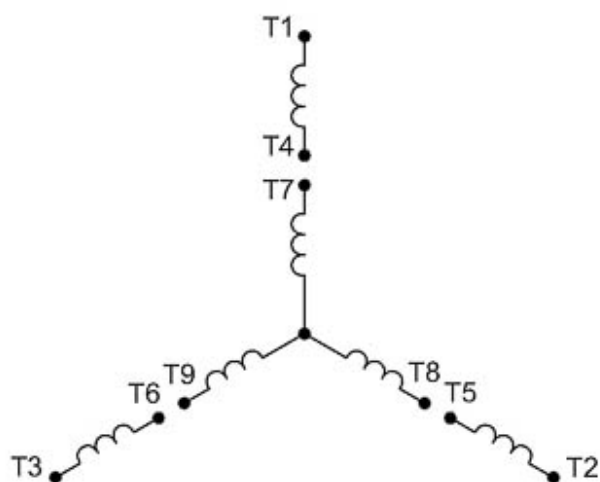
Bearings		Approx. Weight
DE	NDE	lbs
6206ZZ	6205ZZ	59

Nameplate Drawing

Optim JM

TYPE	AEHH8N_JM		CAT. NO.	CJM0024		
OUTPUT	2 HP 1.49 kW		FRAME	145JM	TEFC	
R.P.M.	1740		POLE	4	INS.	F
VOLTS	230 / 460		PHASE	3	Hz	60
AMPS	5.6 / 2.8		CODE	L	S.F.	1.15
AMBIENT	40 °C		NOM. EFF. 86.50		MIN. EFF. 84.00	
BEARINGS	6206ZZ / 6205ZZ				RATING Cont.	
SER. NO.	TBD		DESIGN	B	WT. 59 LBS	
PWM VFD DUTY	VT	CT	CP		S.F.	
	3-60Hz	6-60Hz	60-120Hz		1.0 Only	

Connection Diagram

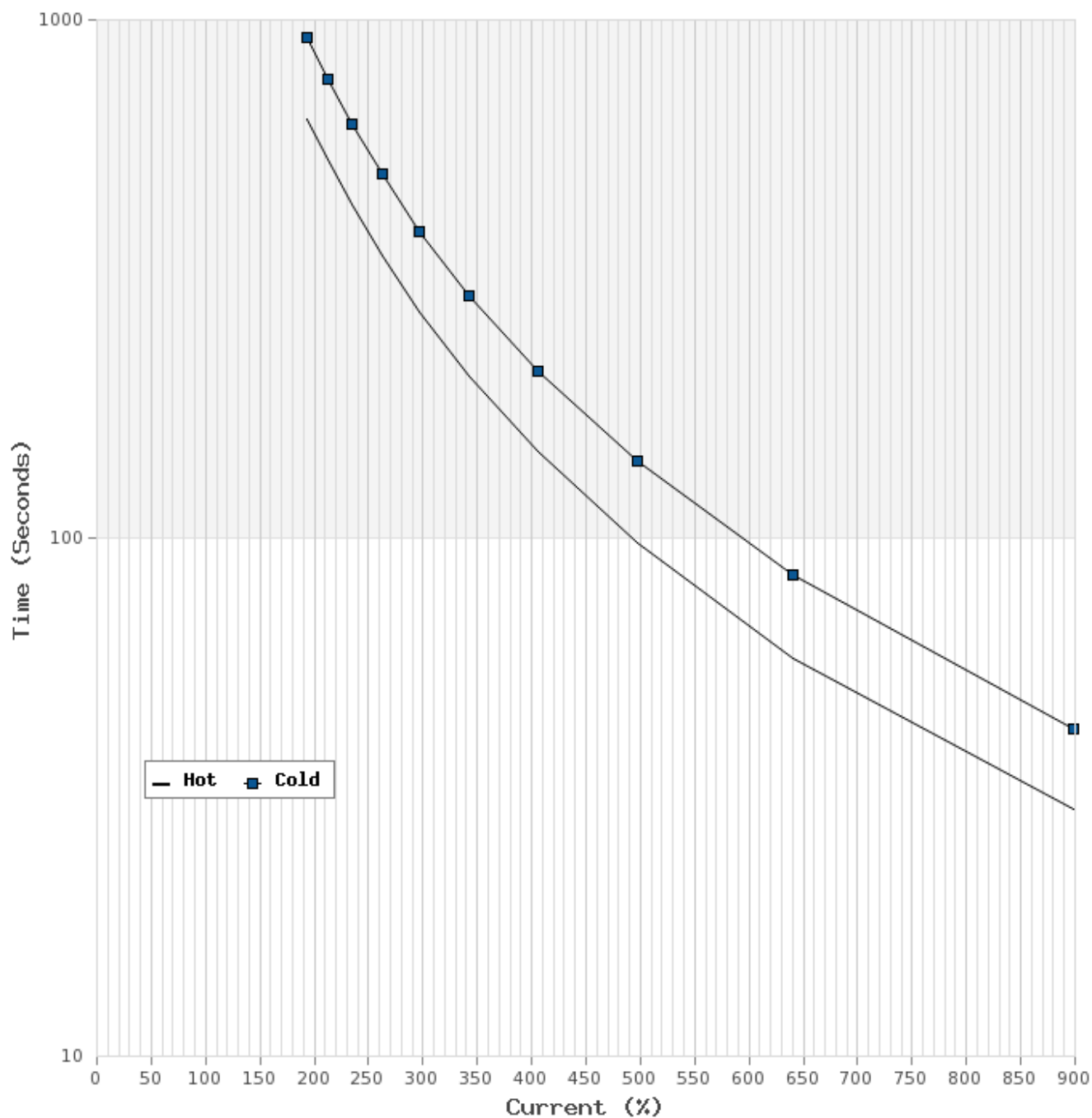


9 LEAD		DUAL VOLTAGE			WYE
VOLTAGE	CONN.	L1	L2	L3	JOIN
HIGH	WYE	1	2	3	4&7,5&8,6&9
LOW	2 WYE	1,7	2,8	3,9	4&5&6

WD_9Y

Thermal Limit Curves

Motor Type: AEHH8N_JM		Catalogue No: CJM0024		Family: Optim JM	
HP	2	Safe Stall Time		Full Load A	5.6 / 2.8 A
Voltage	230 / 460V 60Hz	Hot	30 s	% Inrush	899 / 899 %
RPM	1800	Cold	43 s	Locked Rotor A	50.00 / 25.00 A



T-N and I-N Curves

Motor Type: AEHH8N_JM		Catalogue No: CJM0024		Family: Optim JM	
HP	2	Full Load T	6.04 lb-ft	Full Load A	5.6 / 2.8 A
Voltage	230 / 460V 60Hz	Locked Rotor T	270 %	Locked Rotor A	50.0 / 25.0 A
RPM	1800	Pull Up T	220 %	Break Down T	330 %

