

Customer :
Project Name :
Project No. :
Revision No. :

SPECIFICATION for INDUCTION MOTOR



0		For Bidding			
No.	DATE	DESCRIPTION	PREPARED BY	CHECKED BY	APPROVED BY

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AC INDUCTION MOTOR DATA SHEET

Catalog No.	HES50-36-326T		Item No.			Rev. No.	[]	
Project Name			Project No.			Quantity	sets	
GENERAL SPECIFICATION				PERFORMANCE DATA				
Frame Size	326T		Rated Output	37 kW		50 HP		
Type	PJP		Number of Poles	2				
Enclosure(Protection)	Totally Enclosed / IP55		Rotor Type	Squirrel Cage				
Method of Cooling	IC411(FC)		Starting Method*	D.O.L				
Rated Frequency	60 Hz		Rated Voltage	575 V	460 V	230 V		
Number of Phases	3		Current	Full Load	43.7 A	54.6 A	109.1 A	
Insulation Class	F			Locked-rotor**	850 %	850 %	850 %	
Temp. Rise at full load (by resistance method)			Efficiency					
	at 1.0 S.F	80 deg. C	50% Load 90.0 %					
Motor Location	☐ Indoor ☐ Outdoor		75% Load 92.0 %					
Altitude	Less than 1,000 meter		100% Load 93.0 %					
Relative Humidity	Less than 80 %		Power Factor(p.u)					
Ambient Temp.	40 deg. C (Max.)		50% Load 0.765					
Duty Type	Continuous (S1)		75% Load 0.865					
Service Factor	1.15		100% Load 0.915					
Mounting	B3		Speed at Full Load		3560 r.p.m			
Bearing	Type	Anti-Friction	Torque					
	DE/N-DE	6313ZC3 / 6212ZC3	Full Load 73.22 lb.ft					
	Lubricant	Grease(Polyrex-EM)	Locked-rotor** 150 %					
External Thrust	Not applicable		Breakdown** 230 %					
Coupling Method	☒ Direct ☐ V-belt		Moment of Inertia (J)					
Shaft Extension	Single		Load(Max.) 49.240 lb.ft2					
Terminal	Main	Cast Iron	Motor 4.272 lb.ft2					
Box	Aux.	No	Sound Pressure Level (No-load & mean value at 1m from motor)					
	Location	Refer to Outline Drawing	82 dB(A)					
Application			Vibration 3.8 mm/s (peak)					
Area classification	Hazardous		Permissible number of Cold 3 times					
Type of Ex-Protection	Class I&II, Division 2		consecutive starts Hot 2 times					
Applicable Standard	NEMA MG1, CSA C390		Paint	Munsell No.	4.0PB5.4/5.5(VL-451)			
ACCESSORIES			SUBMITTAL DRAWING					
			Outline Dimension Drawing \ Motor Weight(Approx.)					
			B3		LM-T2326B3PLV25		560 lb.	
SPARE PARTS			REMARK					
			1. Premium efficiency according to NEMA MG1					
			2. Inverter Duty @ 1.0 Service Factor & F Temperature rise					
			-. 10:1 VT (20:1 VT at 50% load)					
			-. 10:1 CT (1 hour duty, 4:1 continuous)					
			-. CHP up to 1.5 times base speed, NEMA MG1 Part31					
			3. CSA Certification					
			-. Class I, Division 2, Group A, B, C & D					
			-. Class II, Division 2 Group E, F & G (Group E : up to 320Fr.)					
			4. Service Factor 1.15 and Temperature rise B are applicable under the condition of sine wave power.					
			5. Service Factor 1.25 is applicable to motors of 100HP or less with temperature rise F & Non-Hazardous.					
			6. Temp. code : T3C(160°C) at sine wave					
Date		DSND	CHKD	CHKD	APPD			
2025-09-19		S.H. LEE	I.K. KIM	R.G. KIM	S.W. KIM			

[Note] Others not mentioned in this data sheet shall be in accordance with maker standard.

Above technical data are only design values and shall be guaranteed with tolerance of applicable standard.

Inspection and performance test shall be done according to maker standard, if not mentioned.

* In case of Inverter-Fed Motor, performance data is based on sine wave tests. It may be different from test data of Inverter combined motor.

** Data is based on rated voltage & frequency and is expressed as a percentage of full-load value.

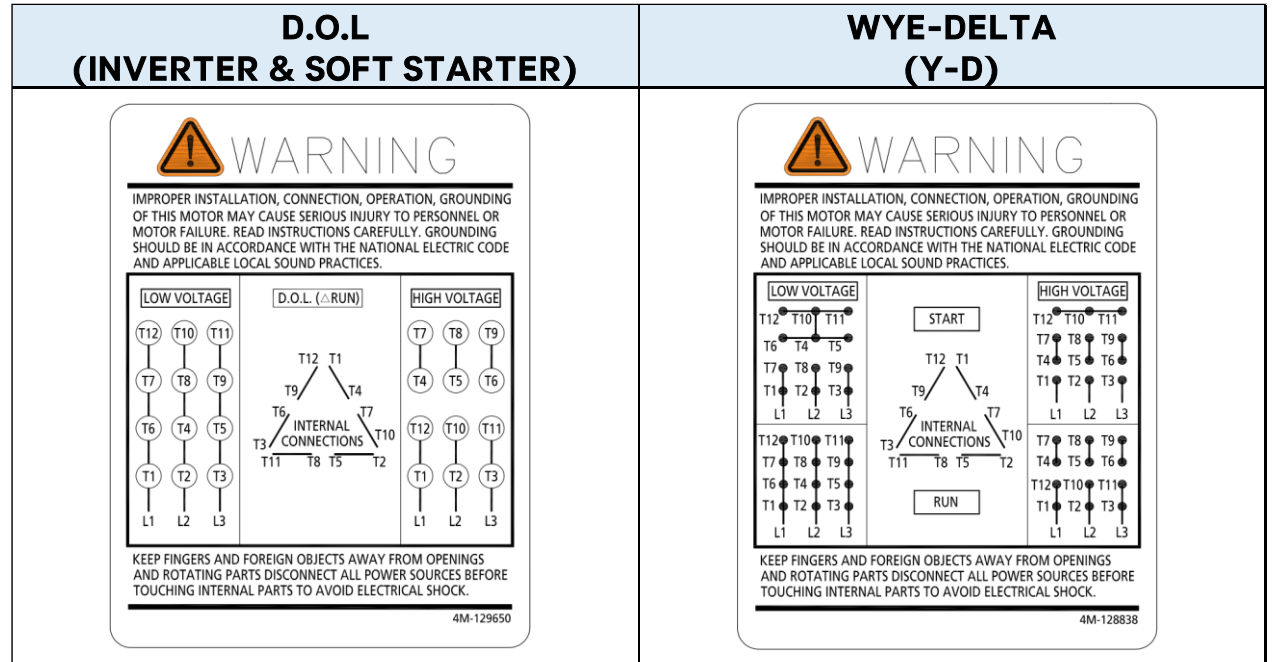
MAIN NAMEPLATE

4.72

2.36

CROWN TRITON G2											
Premium Efficiency AC 3 Phase Motor										CC038A	
50HP 2P 230/460V				Cat. No. HES50-36-326T							
Model HLS326SR135V				INS. Class F HD-F1		Amps 109.1/54.6A					
Type HLS		Duty CONT		Code J		Amb. 40°C		Hertz 60Hz			
Frame 326T		Encl. TEFC		S.F. 1.15		RPM 3560		NEMA Nom. Eff. 93.0%			
Bearing		Drive 6313ZC3		S.F.1.25 (When 100HP or less, Temp Rise F & Non-Hazardous)		3/4 Eff. 92.0%					
		Opp. 6212ZC3		S.F.1.00 (10:1 C.T., 20:1 V.T., NEMA-MG1 Part31)		NEMA Design B Torque					
Usable at		50Hz 50HP 380V 72.5A 2950rpm S.F.: 1.0 Eff.: 92.4% Code: G									
		50Hz 50HP 400/415V 69.0/66.6A 2955/2960rpm S.F.: 1.0 Eff.: 92.4/92.4% Code: H/J									
CSA Certified for		Model -		Type PJP		Temp. Code (sine wave)		Frame 140~320FR 360~400FR 440FR			
		CLASS I, Div. 2, Gr. A, B, C & D CLASS I, Zone 2, Gr. IIA, IIB, & IIC		CLASS II, Div. 2 Gr. E, F & G (Gr. E : Up to 320FR)		Amb. 40°C T3C (160°C) T3B (165°C) T3A (180°C) Amb. 55°C T3A (180°C) T3A (180°C) T3 (200°C)					
No. -				Date -				Weight 560 lb			
4M-136024 MARINE DUTY IEEE45				Made in Vietnam H4 Designed By HYUNDAI, Korea							

WIRING DIAGRAM



APPD BY	S.Y.KIM	UNIT	INCH	SUBJECT	CSA Class I, Division2 Severe Duty (HES, 254-326)	DWG SIZE	A4 (1:1)
CHKD BY	I.K.KIM	SCALE	NONE	NAMEPLATE DRAWING			
CHKD BY	R.G.KIM	PROJEC'N	3rd Angle				
DSND BY	S.H.LEE	DATE	2024.06.07				
				REF. NO	4M-136024 / 4M-129650	Sheet No.	of
				DWG NO	NP-HES50-36-326T	Revision No.	0



PERFORMANCE CURVE

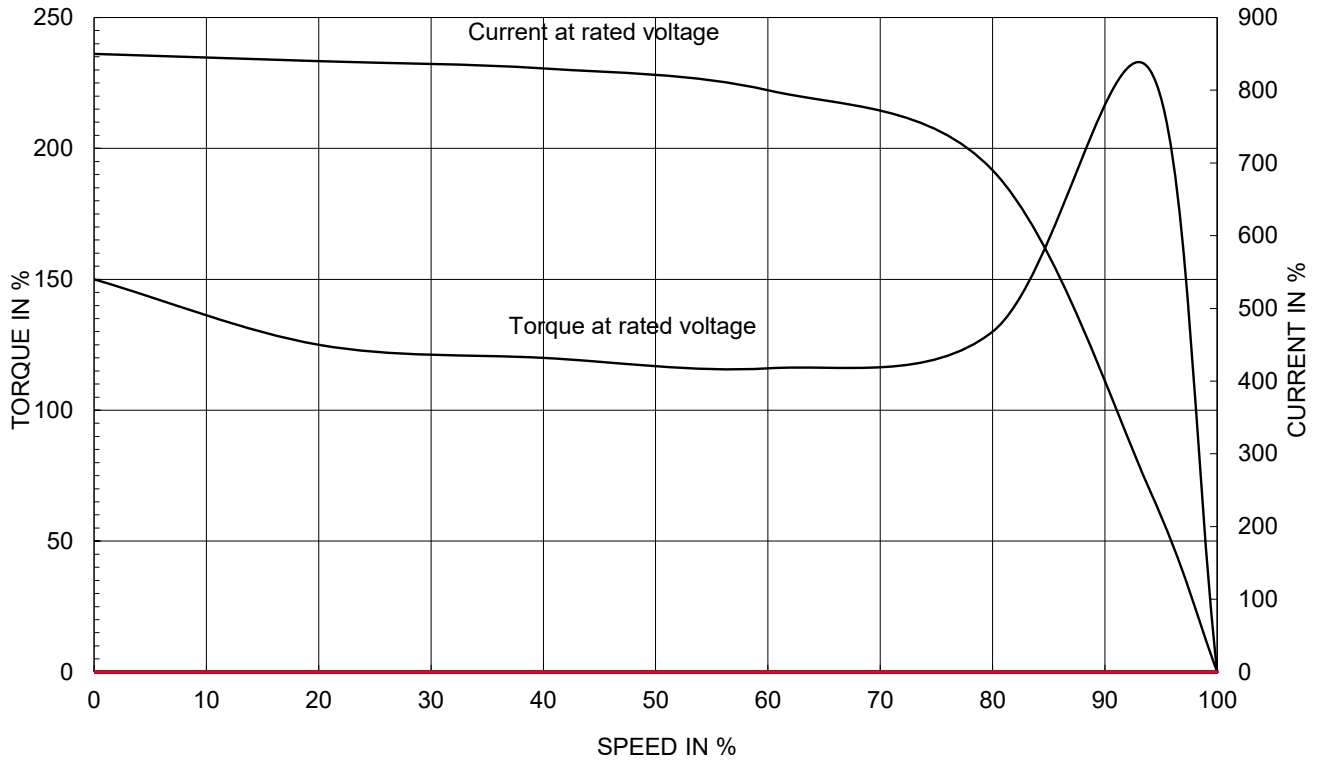
CURVE NO.

PC-HES50-36-326T

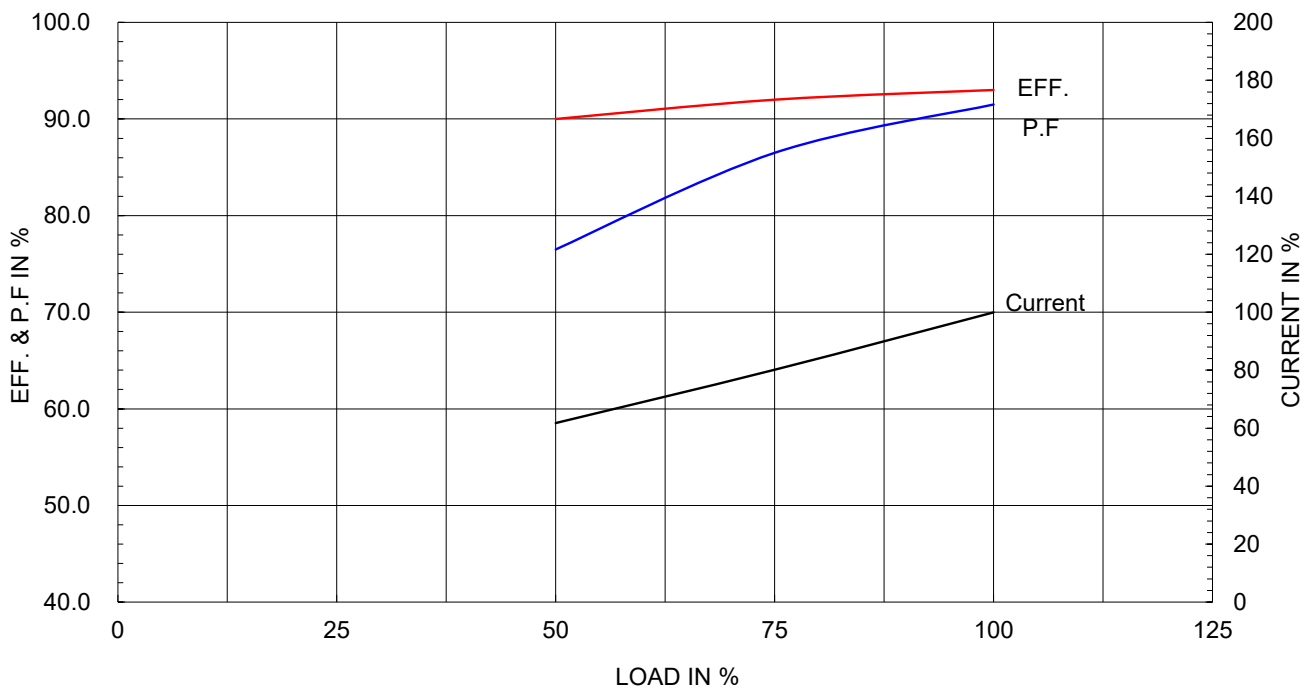
Type :	PJP	
Full Load Torque :	73.22	lb.ft
Load moment of Inertia (J) :	49.240	lb.ft ²
Motor moment of Inertia (J) :	4.272	lb.ft ²

37kW	50HP	2 P	60 Hz
Speed at Full Load :			3560 RPM
Rated Voltage	575V	460V	230V
Full Load Current	43.7A	54.6A	109.1A

SPEED VS TORQUE & CURRENT CURVE

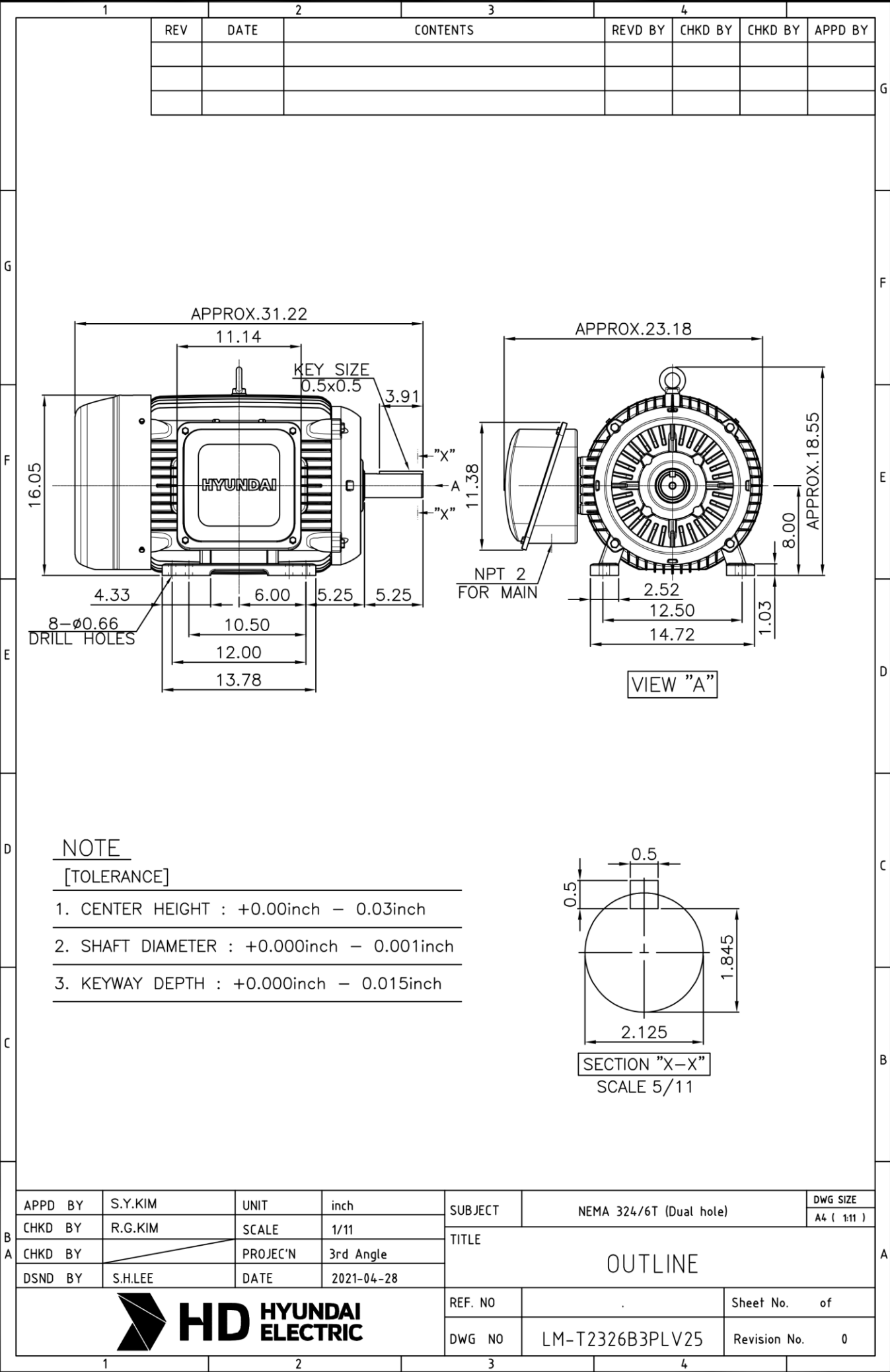


OUTPUT VS EFF., P.F & CURRENT CURVE

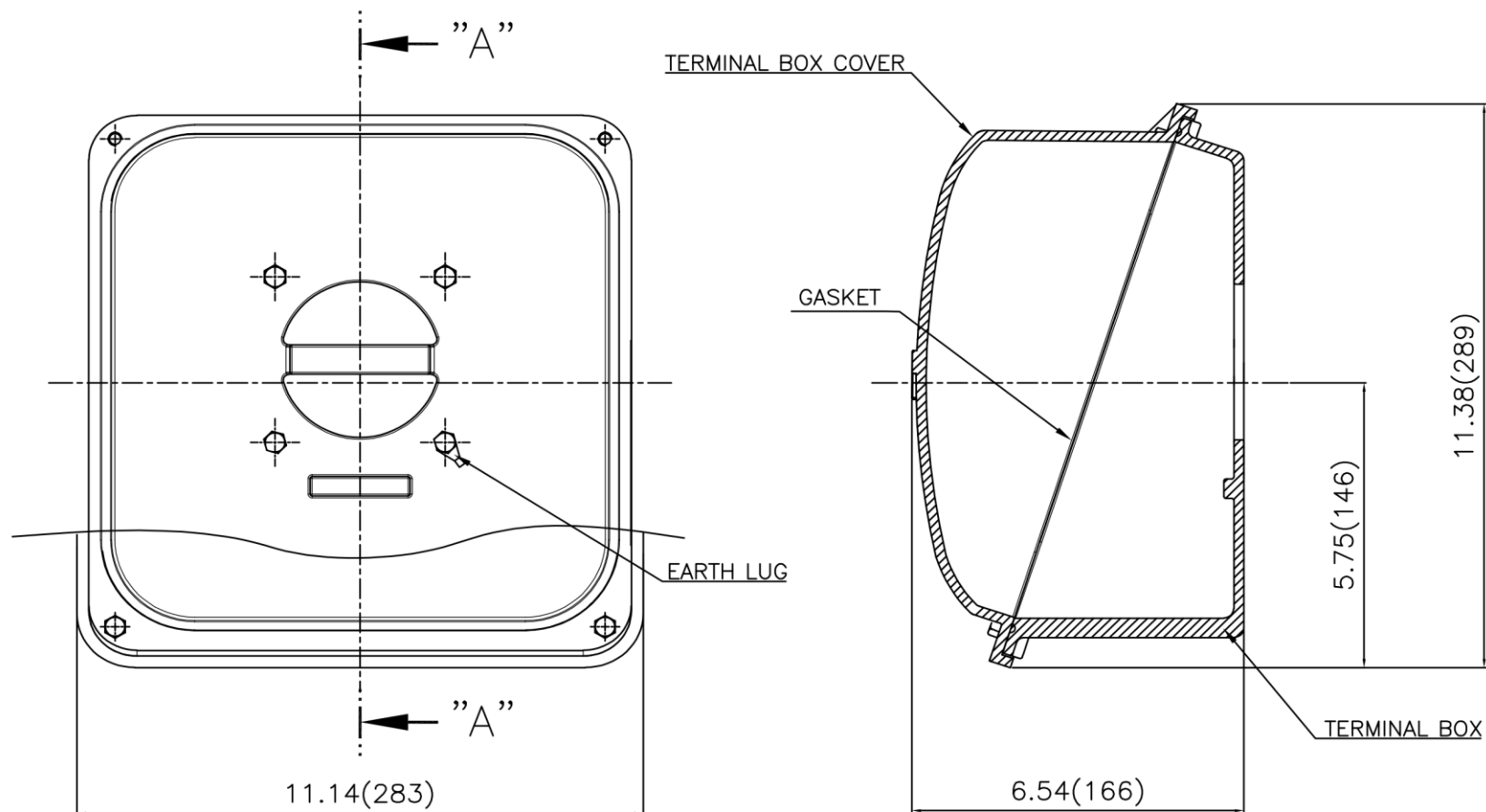


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Cls. I&II, Div. 2
IEEE 841



SEC. "A" - "A"

▽	50S
▽▽	12.5S
▽▽▽	3.2S
▽▽▽▽	0.4S

[illegible]

Q'TY	DESCRIPTION		MATERIAL	DIMENSION	WEIGHT	PART NO.	REMARK	NO.
APPD BY	S.Y.KIM	UNIT	inch(mm)	SUBJECT	FR. 320 (CAST IRON)			DWG SIZE A3 (1:2.5)
CHKD BY		SCALE	1/2.5	TITLE TERMINAL BOX ASS'Y				
CHKD BY	R.G.KIM	PROJEC'N	3rd Angle					
DSND BY	배승희	DATE	2023-10-19					
 HD HYUNDAI ELECTRIC				REF. NO			Sheet No.	of
				DWG NO	3M-248459		Revision No.	0