



GE INDUSTRIAL MOTORS
a **WOLONG** company

Product Technical Information

June 23, 2020

Data shown is for the current revision model #. Ensure your nameplate model # matches.

Model Number:	5KS449SAA202D4
Catalog Number:	M9989
Instruction Manual:	GEI-56128
Connection Diagram:	GEM2034E-FIG20
Outline Drawing:	239C6800AA

Accessory Connection Diagrams

Bearing Thermocouple:	None	Heater:	None
RTD:	None	Thermistor:	None
Thermostat:	None	Winding Thermocouple:	None
Bearing RTD:	None		

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Marks:

MODEL NUMBER:	5KS449SAA202D4	Estimated Weight:	3100 Lbs
Outline Drawing:	239C6800AA	Time Rating:	CONT
Connection Diagram:	GEM2034E-FIG20	Enclosure:	TEFC
Instruction Book:	GEI-56128	Encl Construction:	X\$D
Design Code:	49BD1241B	Ambient Max(°C):	40
Type:	KS	Alt Ambient Max(°C):	60
Frame:	449T	Insulation Class:	H
Phases:	3	NEMA Design:	B
Poles:	4	Nominal Efficiency:	96.5 %
Output Power:	250HP 185KW	Guaranteed Efficiency:	96.2 %
RPM:	1790	3/4 Load Efficiency:	96.9 %
Voltage:	575	KVA Code:	G
Hertz:	60	Max KVAR:	52.4
Amps - FL:	218.0	Power Factor:	89.0
Service Factor:	1.15	Bearing - DE:	6318ZC3
Alt Service Factor:	1.00	Bearing - ODE:	6318ZC3

Enclosure is Totally Enclosed Fan-Cooled

Stamped Nameplate Notes:

FOR DIRECT COUPLED LOAD ONLY
 STAMP NP249A5564P051 AS BELOW:
 MODEL:5KS449SAA202D4 S/N: XXX
 CSA CERTIFIED CSA09.2216219 FOR EX NA IIC 200 C GC
 CL 1 ZONE2 AEX NA IIC 200C;CL 1 DIV2 GRP ABCD 200C
 IN -40C <= AMB <= 40C, 1.0 SF ON SINE-WAVE PWR
 SURF TEMP 260C AT 1.15SF ON SINE-WAVE PWR
 OR 200 C VT OR 230 C CT OR 200 C CHP PWM CONTROL
 ALTERNATE RATING FOR PWM CONTROL 1.0SF 40C AMB
 VT 0-60 HZ, CT 30-60 HZ, CHP 60-75 HZ.

Additional Information:

4P - T EXTN - SPLIT LEAD
 700 CU IN - 3.00" NPT
 OIL RESISTANT SLEEVING ON LEADS
 F1 MOUNTING



Performance Characteristics

1st Winding 1st Connection

Design: 49BD1241B

Marks:

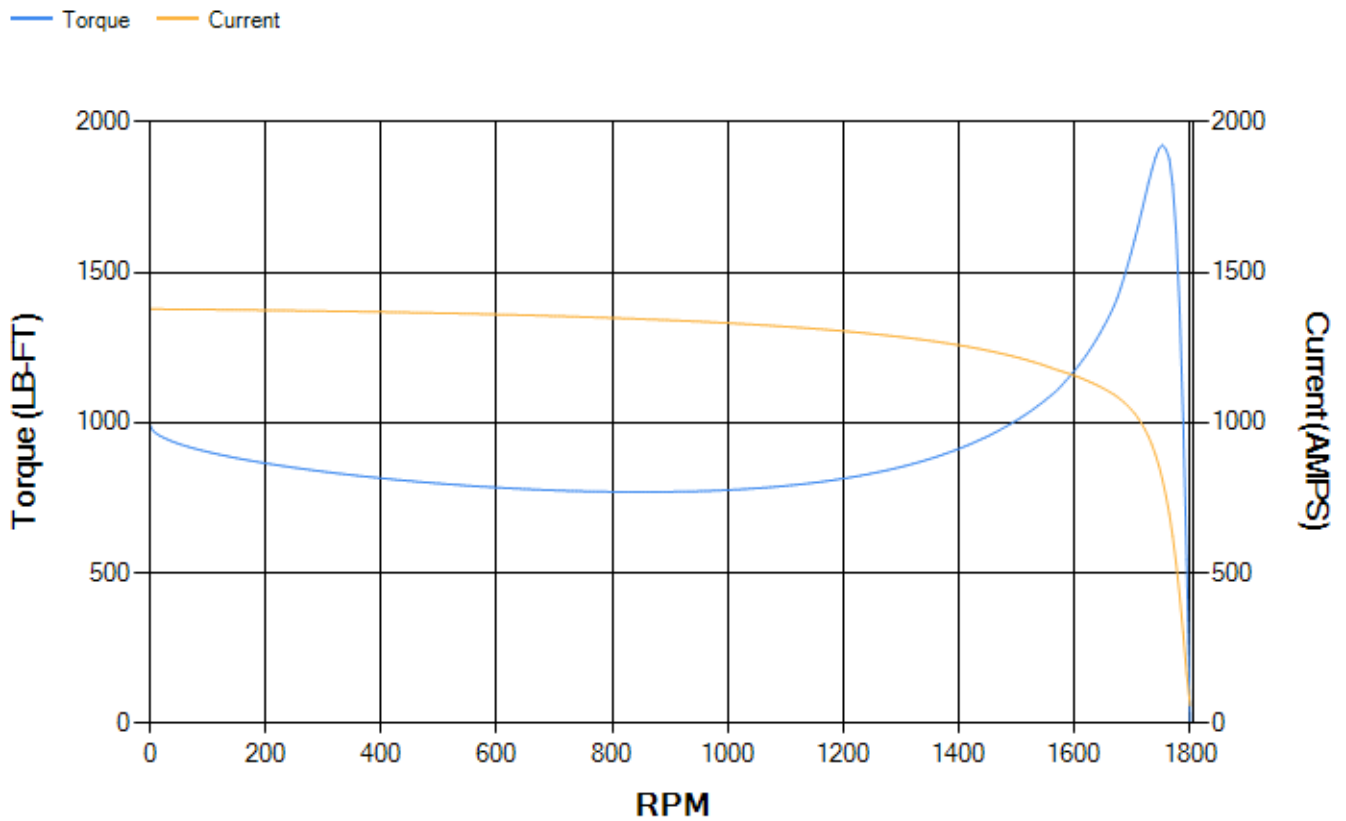
LOAD %	125.0	115.0	100.0	75.0	50.0	25.0	0.0
% EFF	96.2	96.38	96.82	96.88	96.78	95.41	0.00
% PF	89.26	89.25	88.91	86.94	80.99	61.89	3.19
AMPS	272.51	250.23	217.44	166.68	119.41	79.25	58.52

TORQ(FL)#FT	733	TORQ(LR)%FL	135.72	TORQ(BD)%FL	262.21
AMPS(LR)	1378.14	PF AT START	0.23		

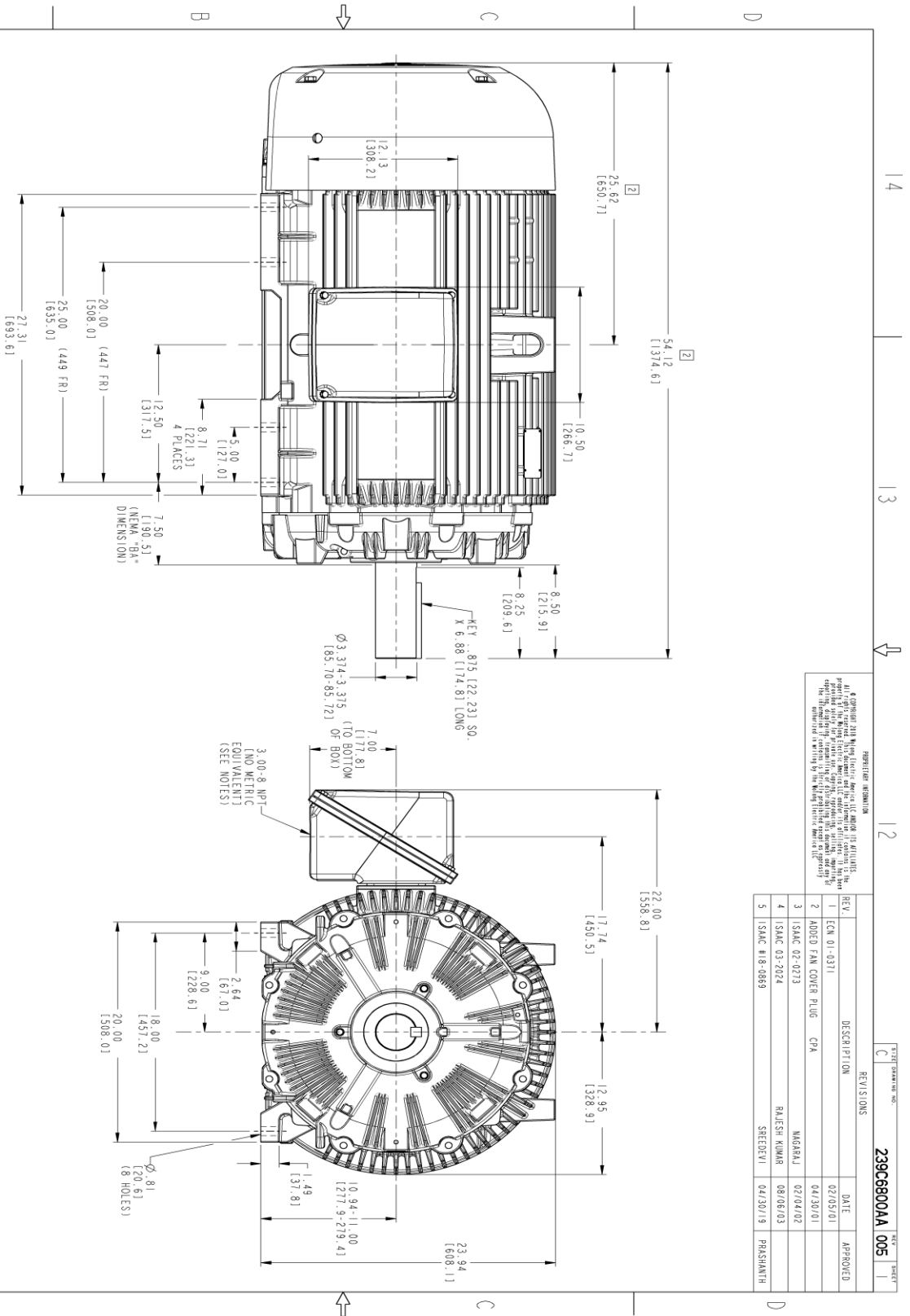
This motor is capable of two cold or one hot start with a maximum connected load inertia of 8396 Lb-Ft Sq (353.47 Kg-meter Sq)at 100% voltage, where the load torque varies with the square of the speed. Acceleration time with maximum inertia and the above load type is 75 seconds. Safe stall time at 100% voltage is 176 seconds cold, 90 seconds hot. Rotor inertia is 137.24 Lb-Ft Sq (5.78 Kg-meter Sq).

Open Circuit A-C:	1.882	Short Circuit D-C:	0.04
Short Circuit A-C:	0.072	X/R Ratio:	14.919
Stator Slots:	72	Rotor Slots:	58

Speed Torque Current Curve (First Connection, First Speed)



Marks:



NOTES:

1. CONDUIT BOX MAY BE PLACED WITH THE ENTRANCE DOWN, UP OR ON EITHER SIDE.
2. F-1 ASSEMBLY AS SHOWN.
3. F-2 ASSEMBLY HAS CONDUIT BOX ON OPPOSITE SIDE.
4. BRACKETED DIMENSIONS ARE METRIC (MILLIMETERS).



SIGNATURES		DATE	
MODEL	J. M. JONES	04/13/00	
CHECKED	W. ELLSWORTH	04/13/00	
DRAWN	D. STARK	04/13/00	
W/E			
QUALITY			
ISSUED	W. ELLSWORTH	04/13/00	
SOLD MODEL:	239C6800AA		

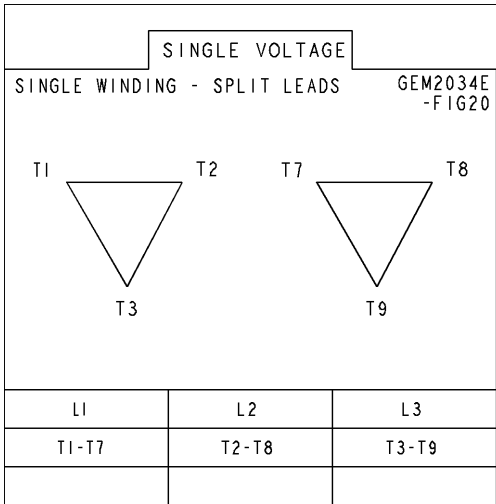
GE INDUSTRIAL MOTORS a WOLONG company	
OUTLINE DRAWING 447/449T TEFC 700 CU. IN. CONDUIT BOX	
SCALE:	0.180
REF. NO.:	
REV.:	005
SHEET:	0F 1

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REV.	DESCRIPTION	DATE	APPROVED
1	ECH 01-0371	02/05/01	
2	ADDED FAN COVER PLUG	04/30/01	
3	ISAC 02-0273	02/04/02	MAGARAJ
4	ISAC 03-2024	08/08/03	RAJESH KUMAR
5	ISAC #18-0869	04/30/19	PREKASHANTH

Marks:

Connection Diagram
GEM2034E-FIG20



End shield Assembly		
Part Description	DE Side Part#	ODE Side Part#
End Shield	115E4355AA1	115E4355LM1
Bearing	235A2514AG01	235A2514AG01
Slinger/Inproseal	149C4399G07	149C4399G07

Fan & Fan Cover Assembly	
Part Description	Part#
Fan	159C7100AA2
Fan Cover	128D6841AA1

Conduit & Accessories Box Assembly	
Part Description	Part#
Conduit Box	118D4408AD2

Mechanical Accessories	
Part Description	Part#
Brake	
Tachometer	

