



GE INDUSTRIAL MOTORS
a **WOLONG** company

Product Technical Information

June 14, 2023

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

Model Number:	5KS445XAA209
Catalog Number:	M9042
Instruction Manual:	GEI-56128
Connection Diagram:	GEM2034E-FIG20
Outline Drawing:	239C6600YF

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:	5KS445XAA209	Estimated Weight:	2140 Lbs
Outline Drawing:	239C6600YF	Time Rating:	CONT
Connection Diagram:	GEM2034E-FIG20	Enclosure:	TEFC
Instruction Book:	GEI-56128	Encl Construction:	841
Design Code:	44BD1351AA	Ambient Max(°C):	40
Type:	KS	Alt Ambient Max(°C):	--
Frame:	445T	Insulation Class:	H
Phases:	3	NEMA Design:	B
Poles:	4	Nominal Efficiency:	96.2 %
Output Power:	200HP 148KW	Guaranteed Efficiency:	95.8 %
RPM:	1790	3/4 Load Efficiency:	--
Voltage:	460	KVA Code:	G
Hertz:	60	Max KVAR:	59.0
Amps - FL:	229.0	Power Factor:	85.0
Service Factor:	1.15	Bearing - DE:	6318ZC3
Alt Service Factor:	--	Bearing - ODE:	6318ZC3

Enclosure is Totally Enclosed Fan-Cooled

Stamped Nameplate Notes:

STAMP NP249A5564P051 AS BELOW:

MODEL:5KS445XAA209 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 -25C <= AMB <= 40C, 1.0 SF ON SINE-WAVE PWR

SURF TEMP 200C 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 20-60 HZ, CHP 60-75 HZ.



Additional Information:

4P - T EXTN - SPLIT LEAD
C/BOX 700 CU IN - 3.00" NPT
INPRO SEAL BOTH ENDS
OIL RESISTANT SLEEVING ON LEADS
.0015" TIR SHAFT RUNOUT
GROUND PAD
F1 MOUNTING
MEETS IEEE 841 STD - 2021 EXCEPT 445 FRAME
CLASS B RISE AT 1.15 SF
PAINTED FRAME ID & SHAFT,
FAN COVER INSIDE & ODE E/S OUTSIDE
ROUTINE TEST REPORT AND 5 POINT VIBRATION TEST
REPORT INCLUDED IN C/B
COPPER WASHER UNDER HEADS OF BEARING CAP BOLTS,
APPLY TITE-SEAL (A50CD427A) ON BEARING CAP SCREWS,
RABBETS AND PLUG THREADS.



Performance Characteristics

1st Winding 1st Connection

Design: 44BD1351AA

Marks:

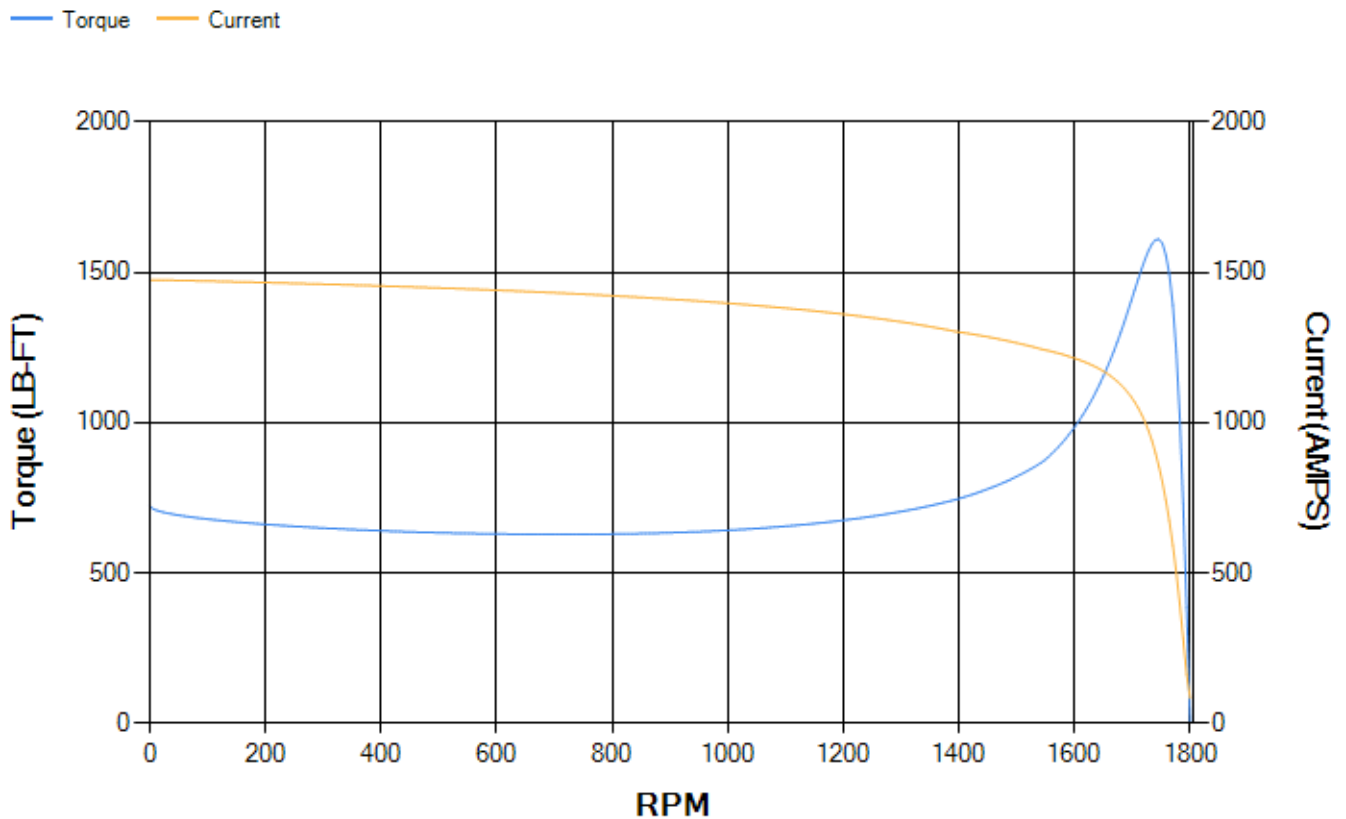
LOAD %	125.0	115.0	100.0	75.0	50.0	25.0	0.0
% EFF	96.12	96.23	96.55	96.34	95.81	93.37	0.00
% PF	86.52	86.14	85.1	81.4	72.54	50.52	3.57
AMPS	281.34	259.69	227.84	179.02	134.66	99.21	82.3

TORQ(FL)#FT 586.55 **TORQ(LR)%FL** 123.41 **TORQ(BD)%FL** 274.28
AMPS(LR) 1475.37 **PF AT START** 0.21

This motor is capable of two cold or one hot start with a maximum connected load inertia of 5515 Lb-Ft Sq (232.18 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 60 seconds. Safe stall time at 100% voltage is 120 seconds cold, 72 seconds hot. Rotor inertia is 79.64 Lb-Ft Sq (3.35 Kg-meter Sq).

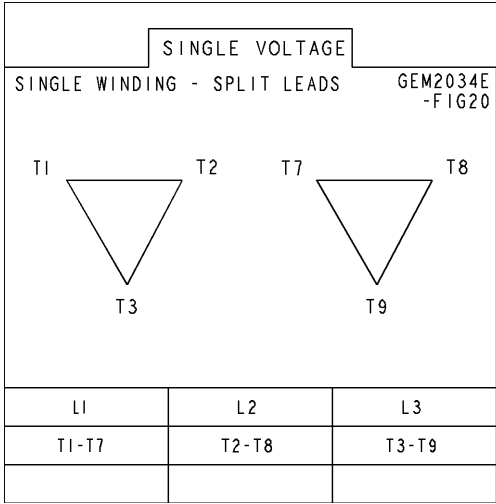
Open Circuit A-C: 1.287 **Short Circuit D-C:** 0.041
Short Circuit A-C: 0.068 **X/R Ratio:** 15.349
Stator Slots: 72 **Rotor Slots:** 58

Speed Torque Current Curve (First Connection, First Speed)



Marks:

Connection Diagram
GEM2034E-FIG20



End shield Assembly		
Part Description	DE Side Part#	ODE Side Part#
End Shield	115E4355AA1	115E4355LM1
Bearing	235A2614AA01	235A2614AA01
Slinger/Inproseal	235A4575GS5	235A4575GS5

Fan & Fan Cover Assembly	
Part Description	Part#
Fan	159C7100G02
Fan Cover	128D6841AA1

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

Mechanical Accessories	
Part Description	Part#
Brake	
Tachometer	

