



GE INDUSTRIAL MOTORS
a **WOLONG** company

Product Technical Information

January 28, 2021

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

Model Number:	5KS404SAA405D1
Catalog Number:	M9189
Instruction Manual:	GEI-56128
Connection Diagram:	GEM2034E-FIG9
Outline Drawing:	239C6400ZJ

Accessory Connection Diagrams

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

Table of Contents

Specification	01
Performance Characteristics	02
Outline Drawing	03
Connection Drawing(s)	04
Spare parts	05

Marks:

MODEL NUMBER:	5KS404SAA405D1	Estimated Weight:	1390 Lbs
Outline Drawing:	239C6400ZJ	Time Rating:	CONT
Connection Diagram:	GEM2034E-FIG9	Enclosure:	TEFC
Instruction Book:	GEI-56128	Encl Construction:	841
Design Code:	40BD4022A	Ambient Max(°C):	40
Type:	KS	Alt Ambient Max(°C):	--
Frame:	404T	Insulation Class:	H
Phases:	3	NEMA Design:	B
Poles:	8	Nominal Efficiency:	92.4 %
Output Power:	50HP 37KW	Guaranteed Efficiency:	91.7 %
RPM:	890	3/4 Load Efficiency:	--
Voltage:	230/460	KVA Code:	G
Hertz:	60	Max KVAR:	29.3
Amps - FL:	145.8/72.9	Power Factor:	69.5
Service Factor:	1.15	Bearing - DE:	6316ZC3
Alt Service Factor:	--	Bearing - ODE:	6316ZC3

Enclosure is Totally Enclosed Fan-Cooled

Stamped Nameplate Notes:

DE BRG 80BC03JP3, ODE BRG 80BC03JP3
 EXCEPTION-IEEE-STD-841-2009:DUAL VOLTAGE 230/460
 STAMP NP249A5564P051 AS BELOW:
 MODEL:5KS404SAA405D1 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 230C AT 1.15SF ON SINE-WAVE PWR
 OR 200C VT OR 230C CT OR 200C CHP PWM CONTROL
 ALTERNATE RATING FOR PWM CONTROL 1.0SF 40C AMB
 VT 0 - 60 HZ, CT 15 - 60 HZ, CHP 60 - 90 HZ.



Additional Information:

8P - T EXTN
PAINTED FRAME ID & SHAFT,
FAN COVER INSIDE & ODE E/S OUTSIDE
C/BOX 700 CU IN - 3.00" NPT
OIL RESISTANT SLEEVING ON LEADS
.0015" TIR SHAFT RUNOUT
ROUTINE TEST REPORT AND 5 POINT VIBRATION TEST
REPORT INCLUDED IN C/B
GROUND PAD
F1 MOUNTING



Performance Characteristics

1st Winding 1st Connection

Design: 40BD4022A

Marks:

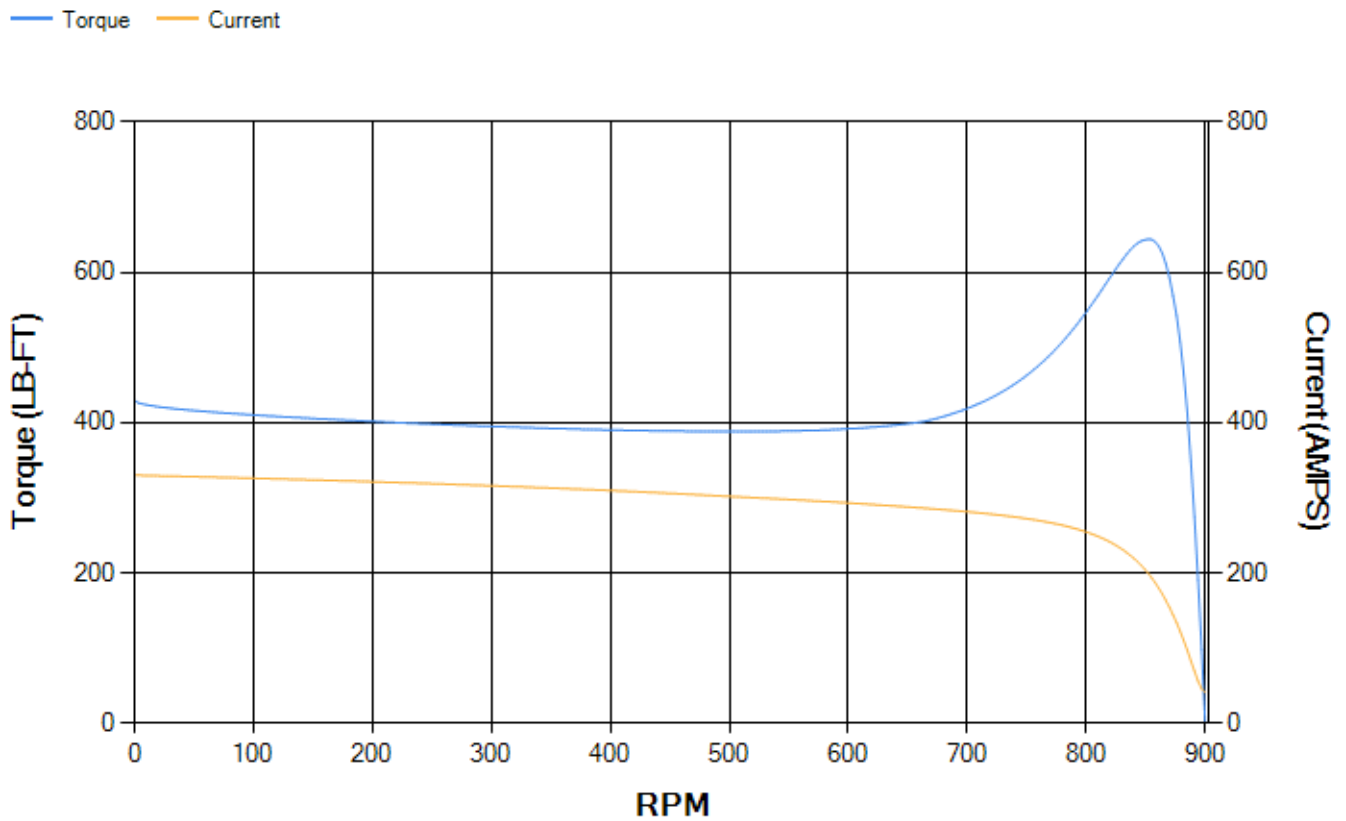
LOAD %	125.0	115.0	100.0	75.0	50.0	25.0	0.0
% EFF	92.09	92.43	93.02	93.06	92.34	88.39	0.00
% PF	73.12	71.99	69.5	62.49	50.15	30.24	3.03
AMPS	86.87	80.87	72.34	60.35	50.53	43.77	40.83

TORQ(FL)#FT	295.22	TORQ(LR)%FL	145.53	TORQ(BD)%FL	217.69
AMPS(LR)	330.02	PF AT START	0.36		

This motor is capable of two cold or one hot start with a maximum connected load inertia of 4530 Lb-Ft Sq (190.71 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 41 seconds. Safe stall time at 100% voltage is 118 seconds cold, 62 seconds hot. Rotor inertia is 25.93 Lb-Ft Sq (1.09 Kg-meter Sq).

Open Circuit A-C:	0.346	Short Circuit D-C:	0.019
Short Circuit A-C:	0.038	X/R Ratio:	7.257
Stator Slots:	72	Rotor Slots:	58

Speed Torque Current Curve (First Connection, First Speed)



Marks:

Connection Diagram
GEM2034E-FIG9



End shield Assembly		
Part Description	DE Side Part#	ODE Side Part#
End Shield	115E4304AA1	115E4304LL1
Bearing	235A2518AC01	235A2518AC01
Slinger/Inproseal	149C4399G06	149C4399G06

Fan & Fan Cover Assembly	
Part Description	Part#
Fan	159C7100G02
Fan Cover	128D6832AA1

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

Mechanical Accessories	
Part Description	Part#
Brake	
Tachometer	

