

# Product Information Packet

November 8, 2016

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

<b>Model Number:</b>	<b>5KS256SAA205D2</b>
<b>Catalog Number:</b>	<b>M9154</b>
<b>Instruction Manual:</b>	GEI-56128
<b>Connection Diagram:</b>	GEM2034E-FIG3
<b>Outline Drawing:</b>	4002B5825PAP5201

Accessory Connection Diagrams			
<b>Bearing Thermocouple:</b>	None	<b>Heater:</b>	None
<b>RTD:</b>	None	<b>Thermistor:</b>	None
<b>Thermostat:</b>	None	<b>Winding Thermocouple:</b>	None
<b>Bearing RTD:</b>	None		

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**Marks:**

<b>MODEL NUMBER:</b>	<b>5KS256SAA205D2</b>	<b>Estimated Weight:</b>	350 Lbs
<b>Outline Drawing:</b>	4002B5825PAP5201	<b>Time Rating:</b>	CONT
<b>Connection Diagram:</b>	GEM2034E-FIG3	<b>Enclosure:</b>	TEFC
<b>Instruction Book:</b>	GEI-56128	<b>Encl Construction:</b>	X\$D
<b>Design Code:</b>	25BD1163A	<b>Ambient Max(°C):</b>	40
<b>Type:</b>	KS	<b>Alt Ambient Max(°C):</b>	60
<b>Frame:</b>	256T	<b>Insulation Class:</b>	H
<b>Phases:</b>	3	<b>NEMA Design:</b>	B
<b>Poles:</b>	4	<b>Nominal Efficiency:</b>	93 %
<b>Output Power:</b>	20HP 14.8KW	<b>Guaranteed Efficiency:</b>	92.4
<b>RPM:</b>	1775	<b>3/4 Load Efficiency:</b>	93.7
<b>Voltage:</b>	230/460	<b>KVA Code:</b>	G
<b>Hertz:</b>	60	<b>Max KVAR:</b>	6.2
<b>Amps - FL:</b>	47.6/23.8	<b>Power Factor:</b>	84.5
<b>Service Factor:</b>	1.25	<b>Bearing - DE:</b>	6309ZC3
<b>Alt Service Factor:</b>	1.00	<b>Bearing - ODE:</b>	6309ZC3

**Enclosure is Totally Enclosed Fan-Cooled**

**Stamped Nameplate Notes:**

SF AMPS 59.0/29.5  
 STAMP NP249A5564P051 AS BELOW:  
 MODEL:5KS256SAA205D2 S/N: XXX  
 CSA CERTIFIED CSA09.2216219 FOR EX NA IIC 200C 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 215C AT 1.25SF ON SINE-WAVE PWR  
 OR 200 C VT OR 215 C CT OR 200 C CHP PWM CONTROL  
 ALTERNATE RATING FOR PWM CONTROL 1.0SF 40C AMB  
 VT 0-60 HZ, CT 6-60 HZ , CHP 60-90 HZ.

**Additional Information:**

4P - T EXTN  
 STANDARD FLOOR MOUNT  
 C/BOX 137 CU IN-1.25 NPT  
 F1 CONDUIT BOX MOUNTING  
 OIL RESISTANT SLEEVING ON LEADS

**Performance Characteristics**

1st Winding 1st Connection

**Design: 25BD1163A**

**Marks:**

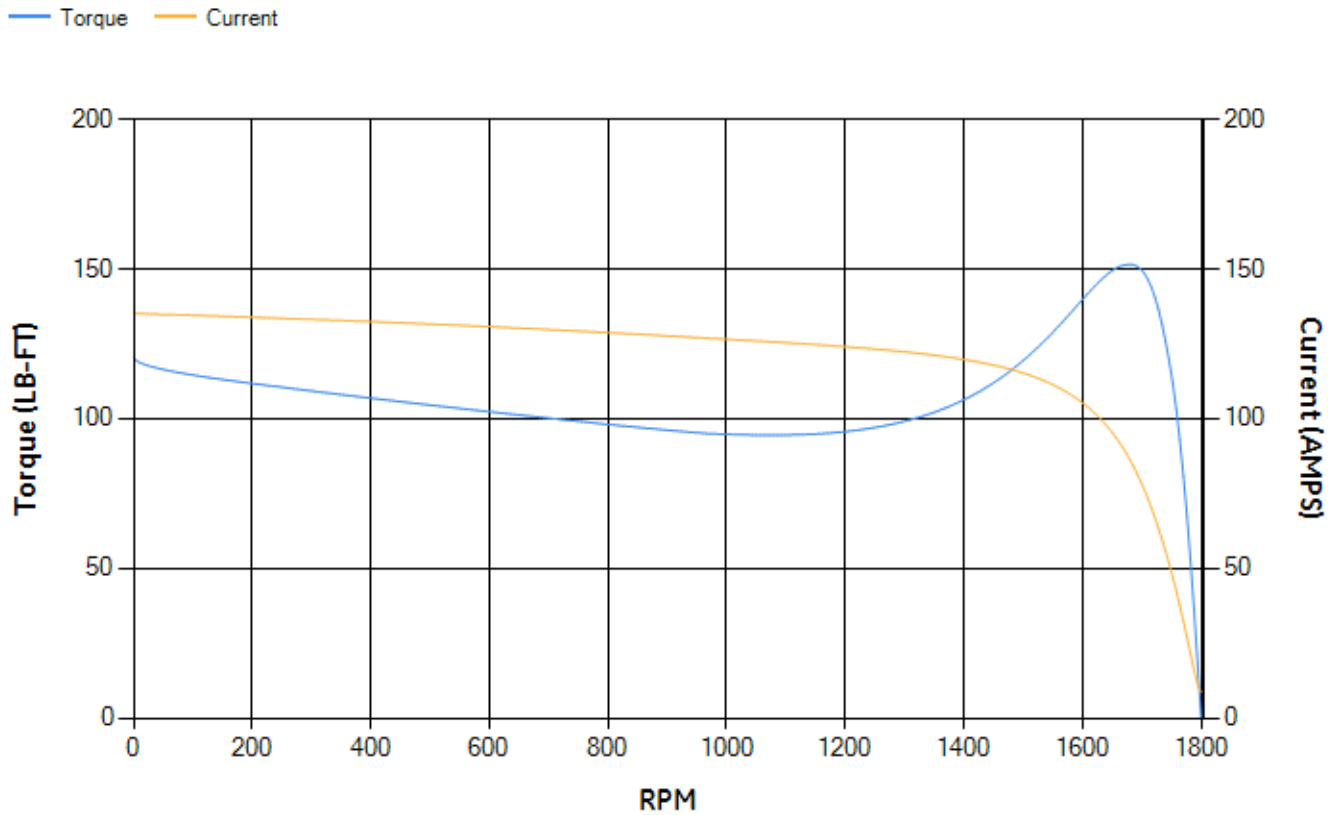
LOAD %	125.0	115.0	100.0	75.0	50.0	25.0	0.0
% EFF	92.13	92.56	93.31	93.72	93.6	91.02	0.00
% PF	86.1	85.75	84.73	80.95	71.89	49.85	4.4
AMPS	29.5	27.12	23.68	18.5	13.91	10.31	8.62

<b>TORQ(FL)#FT</b>	59.21	<b>TORQ(LR)%FL</b>	203.53	<b>TORQ(BD)%FL</b>	254.91
<b>AMPS(LR)</b>	135.12	<b>PF AT START</b>	0.45		

This motor is capable of two cold or one hot start with a maximum connected load inertia of 653 Lb-Ft Sq (27.49 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 43 seconds. Safe stall time at 100% voltage is 98 seconds cold, 62 seconds hot. Rotor inertia is 3.04 Lb-Ft Sq (0.13 Kg-meter Sq).

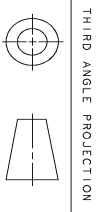
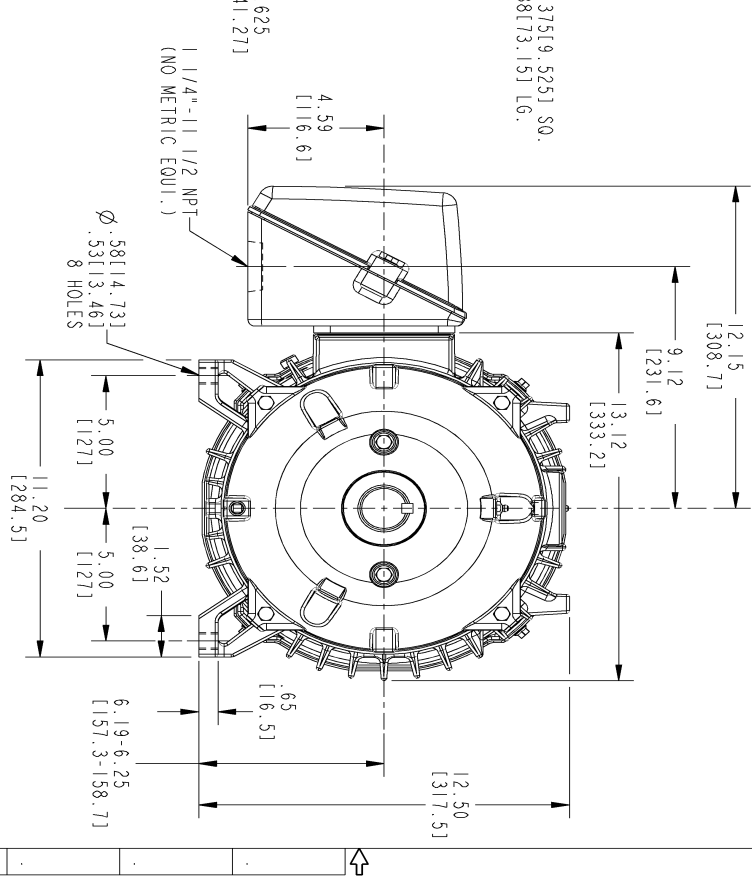
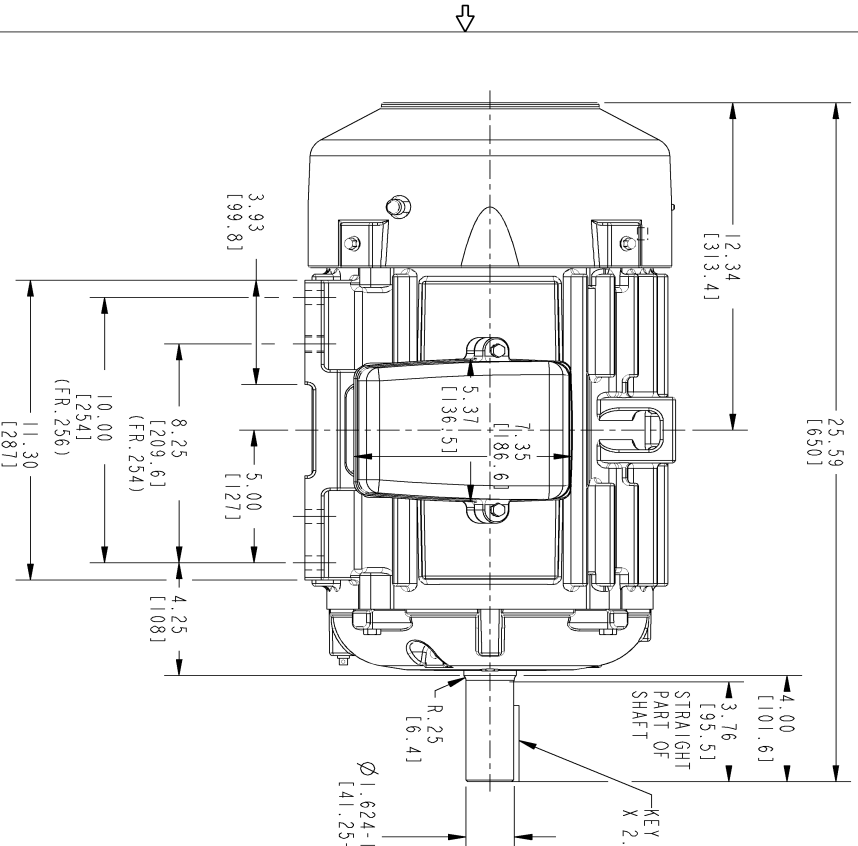
<b>Open Circuit A-C:</b>	0.483	<b>Short Circuit D-C:</b>	0.014
<b>Short Circuit A-C:</b>	0.024	<b>X/R Ratio:</b>	5.127
<b>Stator Slots:</b>	48	<b>Rotor Slots:</b>	40

**Speed Torque Current Curve (First Connection, First Speed)**



Marks:

NOTE 1: CONDUIT BOX MAY BE ASSEMBLED WITH ENTRANCE UP, DOWN OR TO EITHER SIDE.  
 NOTE 2: F1 ASSEMBLY AS SHOWN. F2 ASSEMBLY CONDUIT BOX ON OPPOSITE SIDE FROM SHOWN LOCATION.  
 NOTE 3: SHAFT RUNOUT WILL NOT EXCEED .002 T.I.R.



REVISIONS			
REV.	DESCRIPTION	DATE	APPROVED
1	NOTE X50 ULTRA DELETED	05/20/03	SANJAY
2	ISAAC 09-0868	09/29/09	SAVANTHI
3	ISAAC 09-1036	12/02/09	RAGHU
4	ISSAC 12-0025	01/09/11	RAGHU

SIGNATURES		DATE	
DRAWN	GARY WARRNER	JAN 16/02	
CHECKED	GARY WARRNER	JAN 16/02	
ENGR	GARY WARRNER	JAN 16/02	
ISSUED	GARY WARRNER	JAN 03/02	

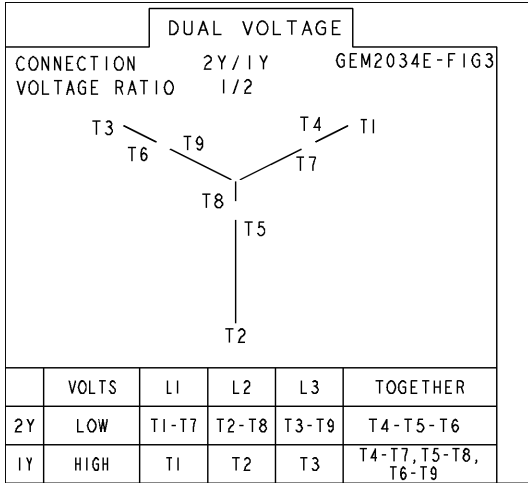
  

		<b>GENERAL ELECTRIC COMPANY</b> Fort Wayne, Indiana	
<b>INDUCTION MOTOR OUTLINE</b> STANDARD CONSTRUCTION FMR: FR250T TFFC			
SCALE:	0.250	REF. NO.:	4002B5825PAP201
SHEET:	1	OF:	1

DISTRIBUTION: PMP-18K15

Marks:

**Connection Diagram**  
**GEM2034E-FIG3**



End shield Assembly		
Part Description	DE Side Part#	ODE Side Part#
End Shield	4004D5283PB1	4004D5283SE1
Bearing	235A2607AA01	235A2607AA01
Slinger/Inproseal	149C4399G02	149C4399G02

Fan & Fan Cover Assembly	
Part Description	Part#
Fan	159C6700G02
Fan Cover	4003C5788PA1

Conduit & Accessories Box Assembly	
Part Description	Part#
Conduit Box	4002B5728PA-G04

Mechanical Accessories	
Part Description	Part#
Brake	
Tachometer	