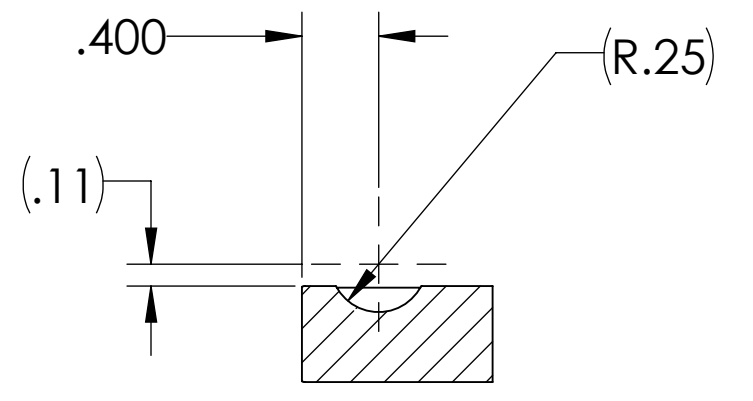


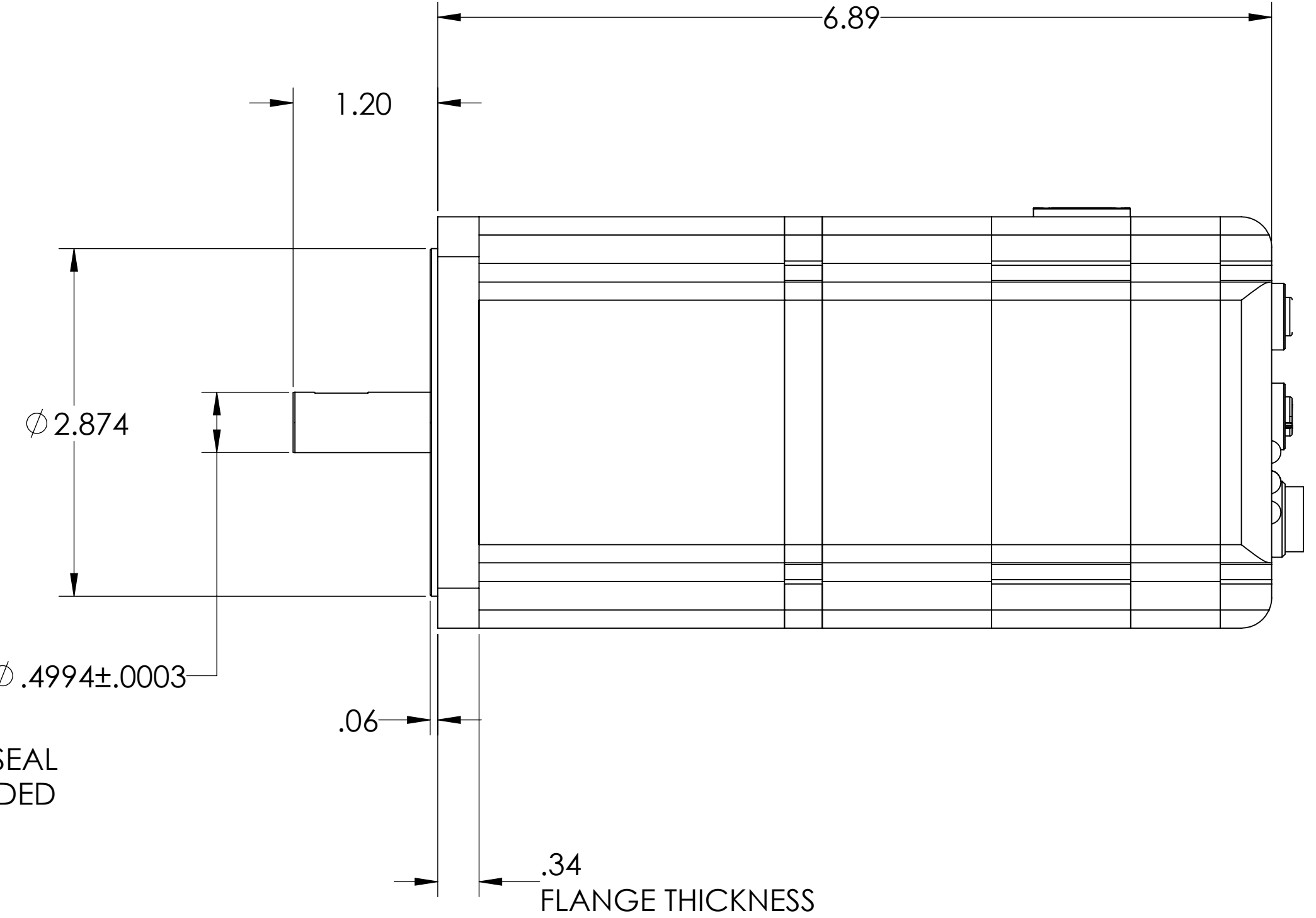
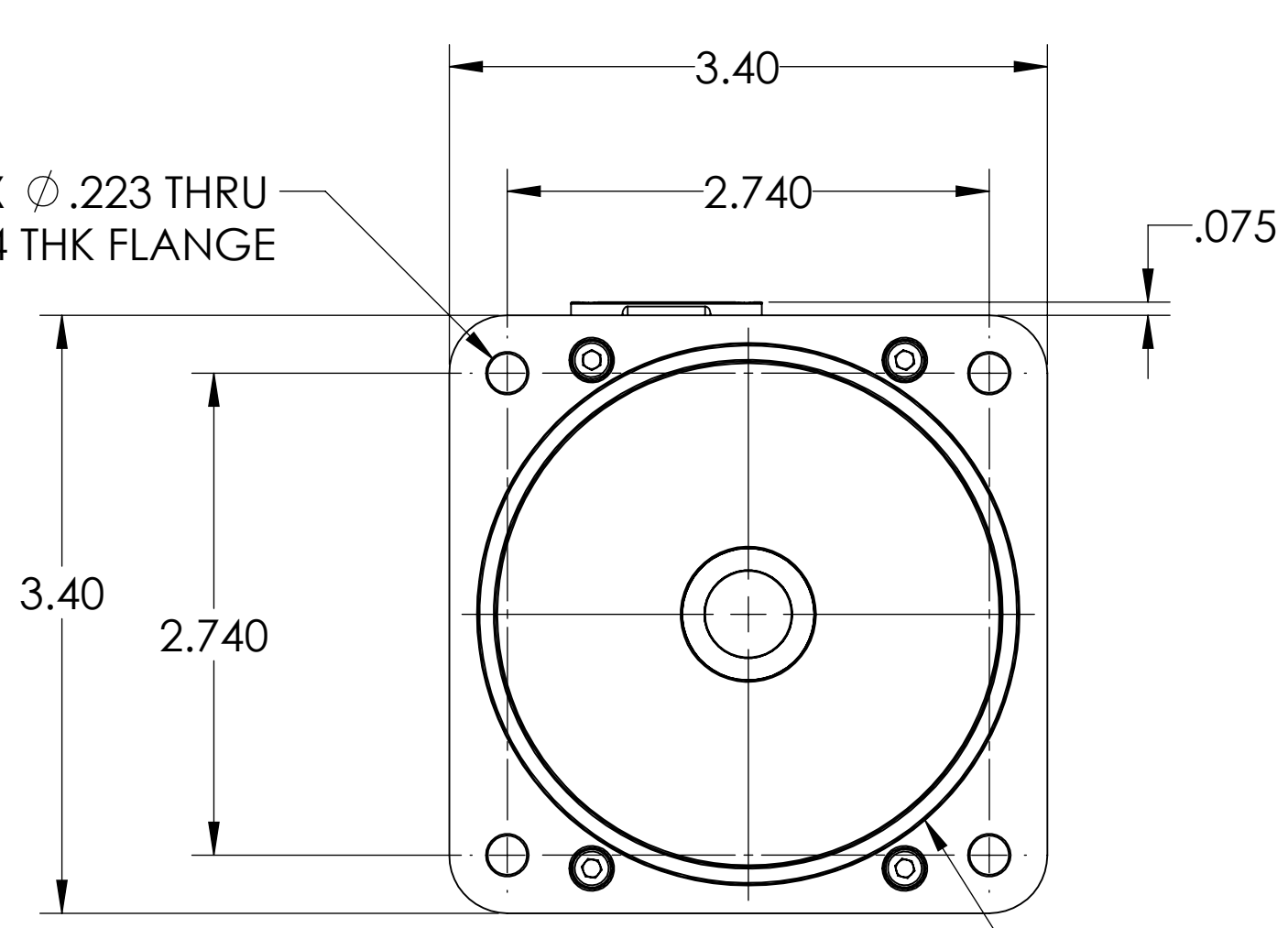
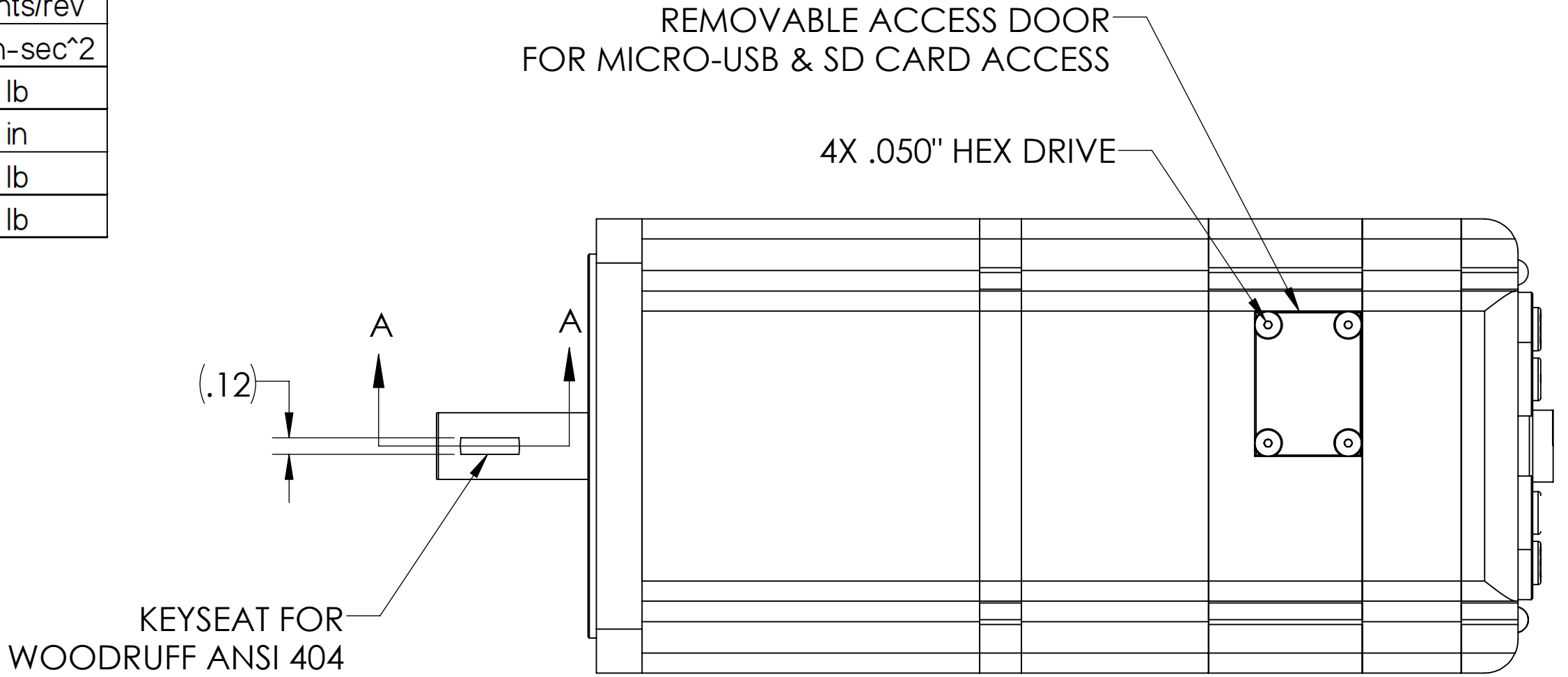
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REVISION INFORMATION			
REV.	ECN	DESCRIPTION	DATE
A	SC001624	PRODUCTION RELEASE	02/01/2019
B	SC001645	MODIFIED PERFORMANCE TABLE	3/6/2019
C	SC001660	ADDED SURFACE MODEL	4/1/2019

Performance at 25°C		
Performance	Value	Units
Continuous Torque @48V	190	oz-in
Peak Torque	330	oz-in
Nominal Continuous Power	460	Watts
No Load Speed	4900	RPM
Max. Continuous Current @ 4500 RPM	13	Amps
Peak Power @ 3300 RPM	1100	Watts
Voltage Constant	8.9	V/krpm
Inductance	0.315	mH
Winding resistance	0.055	Ohms
Encoder Resolution	4000	counts/rev
Rotor Inertia	0.0142	oz-in-sec ²
Weight	7.5	lb
Shaft Diameter	0.5	in
Shaft, Radial Load	30	lb
Shaft, Axial Thrust Load	3	lb



SECTION A-A

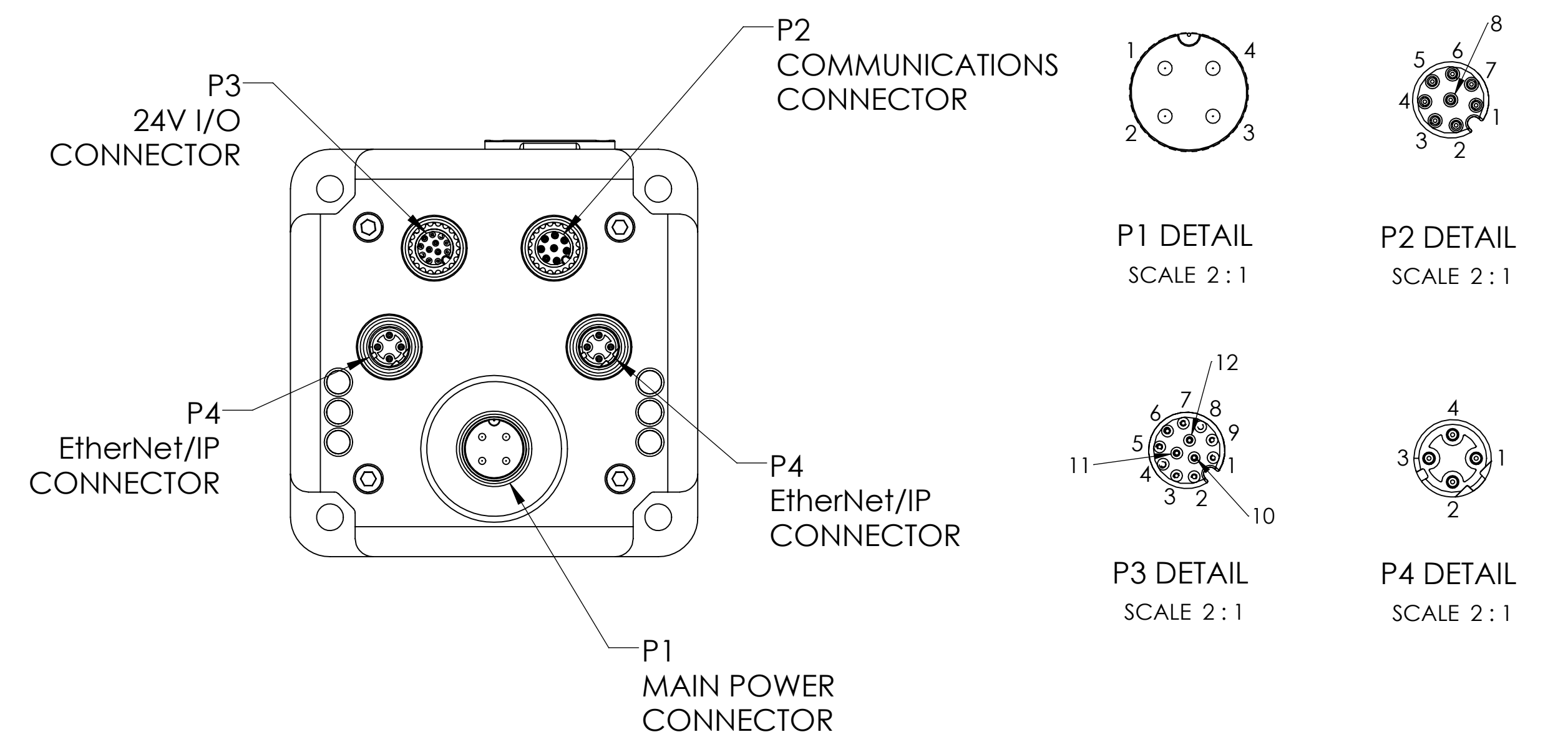


P1 Main Power Connector			
Pin	Description	Specifications	Notes
1	Control Power In	+24V (±20%) 32V Max	Also Supplies I/O
2	Chassis		
3	Control, Com, I/O and Amplifier Ground	Common Ground	Nonisolated
4	Amplifier Power In	+24V Min, 48V Max	Powers Amplifier Only

P2 Communications Connector			
Pin	Description	Specifications	Notes
1	Control, Com, I/O and Amp Ground	Common Ground	Nonisolated
2	RS-485 B, Com ch. 0	115.2 Kbaud Max	
3	RS-485 A, Com ch. 0	115.2 Kbaud Max	
4	Encoder A+ Input/Output	125 KHz Individual Line Frequency	Configurable as Encoder Output
5	Encoder B- Input/Output	125 KHz Individual Line Frequency	Configurable as Encoder Output
6	Encoder A- Input/Output	125 KHz Individual Line Frequency	Configurable as Encoder Output
7	+5V Out	50 mA Max	
8	Encoder B+ Input/Output	125 KHz Individual Line Frequency	Configurable as Encoder Output

P3 24V I/O Connector			
Pin	Description	Specifications	Notes
1	IN0 GP, Discrete or Analog Input	Inp Impedance > 10 kohm	For Inputs
2	IN1 GP, Discrete or Analog Input	Inp Impedance > 10 kohm	7 Configurable Inputs
3	IN2 Pos Limit or GP	Inp Impedance > 10 kohm	Low Lvl Thld: 36V Max
4	IN3 Neg Limit or GP	Inp Impedance > 10 kohm	High Lvl Thld: 50V Min
5	IN/OUT4 GP or Ext Enc. Index Capture	Inp Impedance > 10 kohm	Inp Hysteresis: 10V Min
6	IN/OUT5 GP or Int Enc. Index Capture	Inp Impedance > 10 kohm	Analog Input Scale: 10V FS
7	IN6 GP, G Cmd	Inp Impedance > 10 kohm	
8	IN7 Drive Enable	Inp Impedance > 10 kohm	
9	OUT8 Brake or GP	250 mAmps Max	For Outputs: Do Not Exceed
10	OUT9 NOT FAULT	250 mAmps Max	500 mAmps Combined
11	+24 VDC Out (Supplied from P1, Pin 1)	12.5V Min, 23V Max Load 2 Amps Max	
12	Ground Common	Common Ground	Nonisolated

P4 EtherNet/IP Connectors			
Pin	Description	Specifications	Notes
1	+TX		
2	+RX		
3	-TX		
4	-RX		



UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES		CAD GENERATED DRAWING. DO NOT MANUALLY UPDATE			
TOLERANCES ARE:		APPROVALS		DATE	
DECIMALS	ANGLES			01/23/2019	
XXX ±.010	+0°30'				
XXXX ±.005	FRACTIONS				
XXXX ±.0005	1/164				
DO NOT SCALE DRAWING		DRAWN		TITLE	
		D.KANG		SMARTMOTOR, SM34166MT2-BRK-EIP	
		CHECKED		REV	
				C	
MATERIAL		ENGR		SHEET 1 OF 1	
		MFG ENGR		Date: 29-Aug-2019 15:03	
FINISH		SCALE		1:1	
		CAGE CODE		1K426	
		DWG. NO.		SM34166MT2-BRK-EIP	
		MFG FILE		SM34166MT2-BRK-EIP	