

MOTOR DATA @ 460 VAC (TRAP)		
MOTOR PARAMETERS	UNITS	VALUE
HORSEPOWER	HP RATED	.83
	HP	.62
	KW RATED	.62
MAX. OPERATING SPEED	N. MAX RPM	5000
SPEED @ RATED TORQUE	N RATED RPM	4000
* CONTINUOUS RATED TORQUE @ 4000 RPM	IN-LBS[Nm]	13.0[1.5]
* CONTINUOUS STALL TORQUE	IN-LBS[Nm]	16.0[1.8]
CONTINUOUS LINE CURRENT	AMPS	1.9
PEAK TORQUE	IN-LBS[Nm]	58.8[6.6]
PEAK CURRENT	AMPS	7.0
MAX. THEORETICAL ACCEL.	RAD/SEC <sup>2</sup>	95.610
TORQUE SENSITIVITY	Kt IN-LBS/AMP[Nm/AMP]	8.3[.94]
BACK EMF (LINE TO LINE)	Vrms/Krpm	74.2
D.C. RESISTANCE (P-P)	OHMS	15.3
INDUCTANCE (P-P)	MILLIHENRIES	39.7
ROTOR INERTIA	Jm IN-LBS-SEC <sup>2</sup> [Kg-M <sup>2</sup> ]	0.000615[0.0000693]
STATIC FRICTION	Tf IN-LBS[Nm]	0.4[0.05]

\*25°C AMBIENT WITH A MAXIMUM CASE TEMPERATURE OF 100°C ON MOTOR. MOTOR MOUNTED ON A 10" X 10" X 1/4" ALUMINUM HEATSINK. THERMOSTAT IN STATOR WINDINGS WILL OPEN IF WINDING TEMPERATURE EXCEEDS 155°C. THIS ALLOWS FOR AN APPROXIMATE +10% HEADROOM IN THE CONTINUOUS TORQUE RATING BEFORE THERMOSTAT OPENS.

**MECHANICAL NOTES:**

1. AXIAL LOAD: 25 LBS MAX
2. RADIAL LOAD: 40 LBS MAX @ 1" FROM FACE
3. MOTOR SEALED TO IP65.
4. MOTOR WEIGHT: 9.4 LBS. [ 4.3 Kg]
5. MOTOR FINISH: BLACK EPOXY
6. MOTOR OUTPUT SHAFT: STAINLESS STEEL

**FAILURE BRAKE:**

MIN HOLDING TORQUE: 60 IN-LBS  
INPUT VOLTAGE: 24 VOLTS

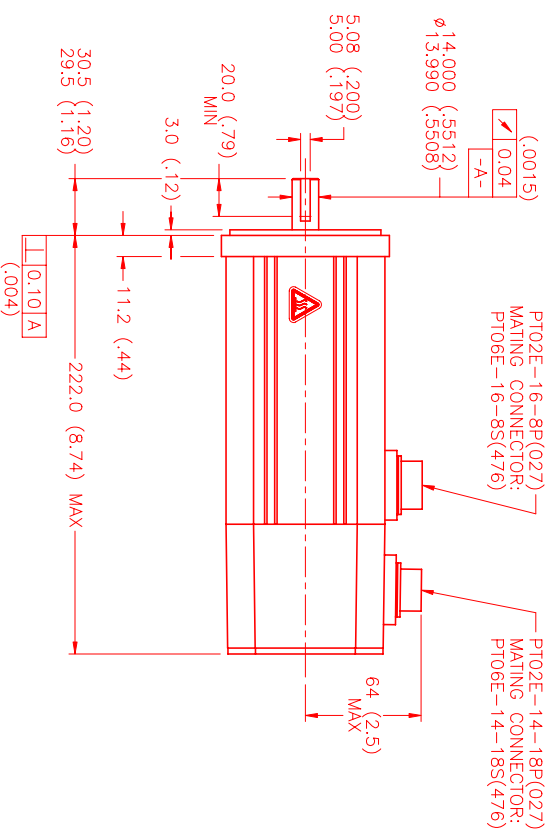
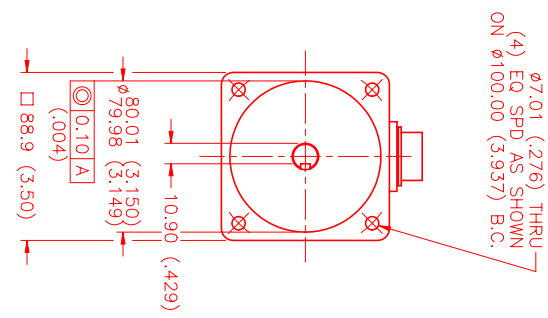
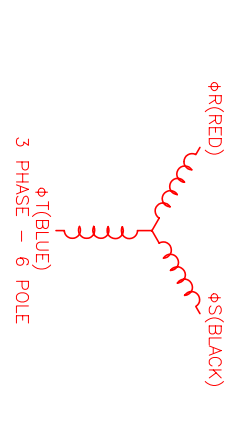
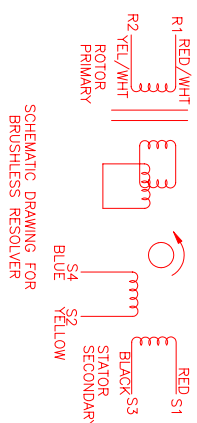
CONNECTION CHART  
MOTOR/BRAKE CONNECTOR:  
PT02E-16-8P(027)  
(270-00032)

RESOLVER/THERM CONNECTOR:  
PT02E-14-18P(027)  
(270-00024)

MOTOR/BRAKE	WIRE FUNCTION	WIRE COLOR	WIRE LEADS
A	ΦR	RED	RED
B	ΦS	BLACK	BLACK
C	ΦT	BLUE	BLUE
D	PE GND	GRN/YEL	BLACK
E	BRK SHLD	-	RED
F	BRK (+)	DIODE	BLUE
G	BRK (-)	PT1N4007	YEL/WHI
H	-	-	RED/WHI

RES/THERM	WIRE FUNCTION	WIRE COLOR	WIRE LEADS
U	THERM	BLACK	BLACK
N	THERM	BLACK	BLACK
H	SIN	YELLOW	YELLOW
G	COS GND	BLACK	BLACK
S	COS	RED	RED
F	SIN GND	BLUE	BLUE
R	REF GND	YEL/WHI	YEL/WHI
E	REF	RED/WHI	RED/WHI
D	RES. SHLD	GRN/YEL	GRN/YEL
P	GND	GRN/YEL	GRN/YEL
A	-	-	-
B	-	-	-
C	-	-	-
J	-	-	-
K	-	-	-
L	-	-	-
M	-	-	-
T	-	-	-

MOTOR/BRAKE	WIRE FUNCTION	WIRE COLOR	WIRE LEADS
A	ΦR	RED	RED
B	ΦS	BLACK	BLACK
C	ΦT	BLUE	BLUE
D	PE GND	GRN/YEL	BLACK
E	BRK SHLD	-	RED
F	BRK (+)	DIODE	BLUE
G	BRK (-)	PT1N4007	YEL/WHI
H	-	-	RED/WHI



TITLE: C:/PMP/460/MET/RES/CONV/BRK DRAWING NUMBER: MPM891CTJ7G1R	
REVISIONS REV. DESCRIPTION DATE APP'D. PRELIMINARY 11/30/99 LIN	
NO. PART NUMBER UNLESS SPECIFIED	DESCRIPTION QTY.
DRAWN: MPM CHECKED: LIN DATE: 11/30/99 MATERIAL: "C" /TRAP /460 /MET /RES /CONV /BRK	MTS Systems Corporation Automation Division 1/2:1