

# PRODUCT INFORMATION PACKET



Model No: EM3405F  
Catalog No: EM3405F  
1/3 HP Condenser Fan Motor, 825 RPM, 208-230 Volts, 48 Frame, TEAO  
Condenser Fans Motors



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The REGAL logo is a grey rectangular box with the word 'REGAL' in white, bold, uppercase letters. It is positioned on a blue and black halftone background that tapers to the right.

REGAL



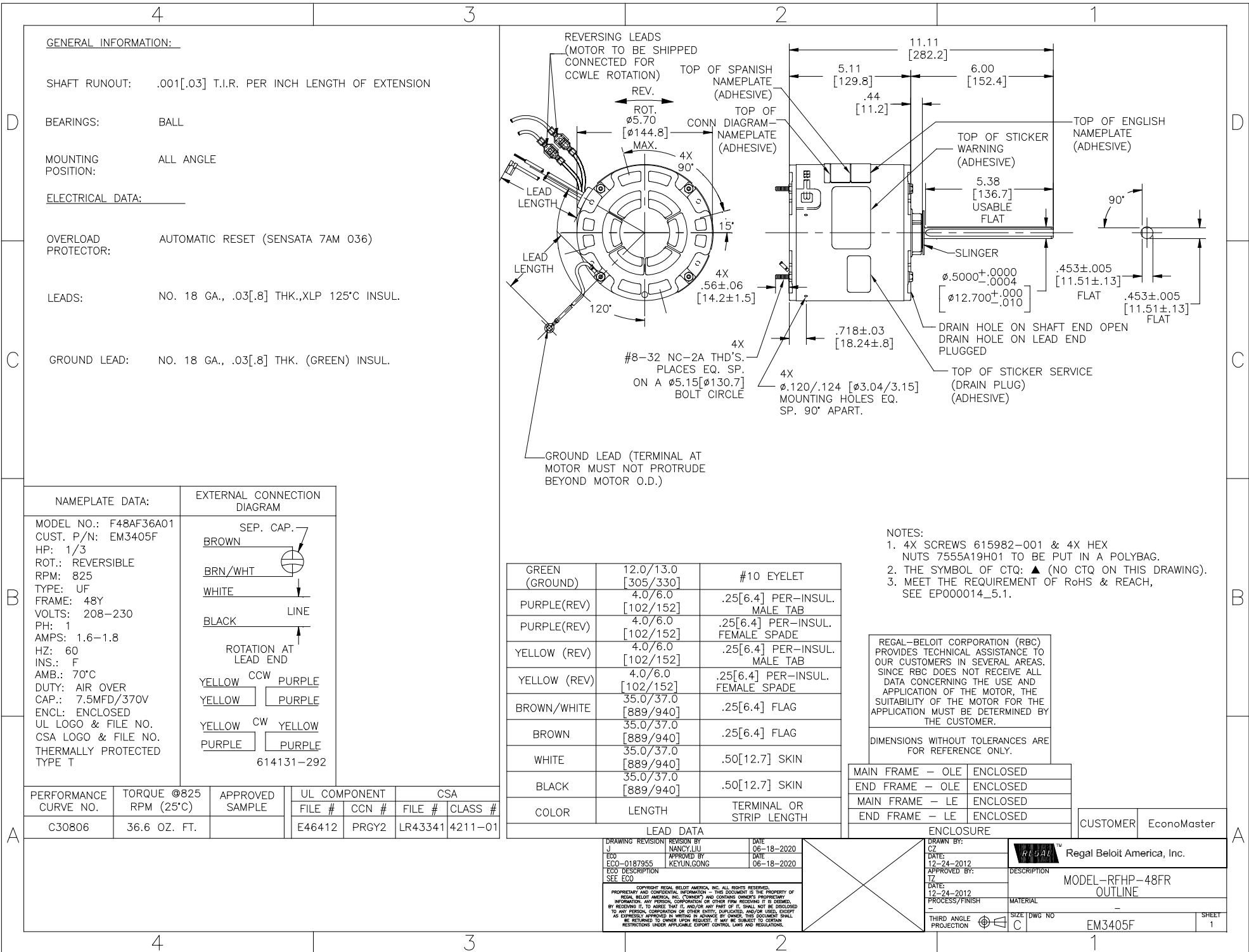
**Nameplate Specifications**

Output HP	1/3 Hp	Output KW	0.25 kW
Frequency	60 Hz	Voltage	208-230 V
Current	1.6-1.8 A	Speed	825 rpm
Service Factor	1	Phase	1
Duty	Air Over	Insulation Class	F
Frame	48Y	Enclosure	Totally Enclosed
Thermal Protection	Automatic	Ambient Temperature	70 °C
UL	Recognized	CSA	Y
CE	N		

**Technical Specifications**

Electrical Type	Permanent Split Capacitor	Starting Method	Across The Line
Poles	8	Rotation	Reversible
Mounting	Extended Studs	Motor Orientation	Any
Drive End Bearing	Ball	Opp Drive End Bearing	Ball
Frame Material	Rolled Steel	Shaft Type	Flat
Overall Length	11.67 in	Frame Length	4.50 in
Shaft Diameter	0.500 in	Shaft Extension	6.0 in
Connection Drawing	614131-292	Outline Drawing	EM3405F-S01

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**GENERAL INFORMATION:**

SHAFT RUNOUT: .001[.03] T.I.R. PER INCH LENGTH OF EXTENSION

BEARINGS: BALL

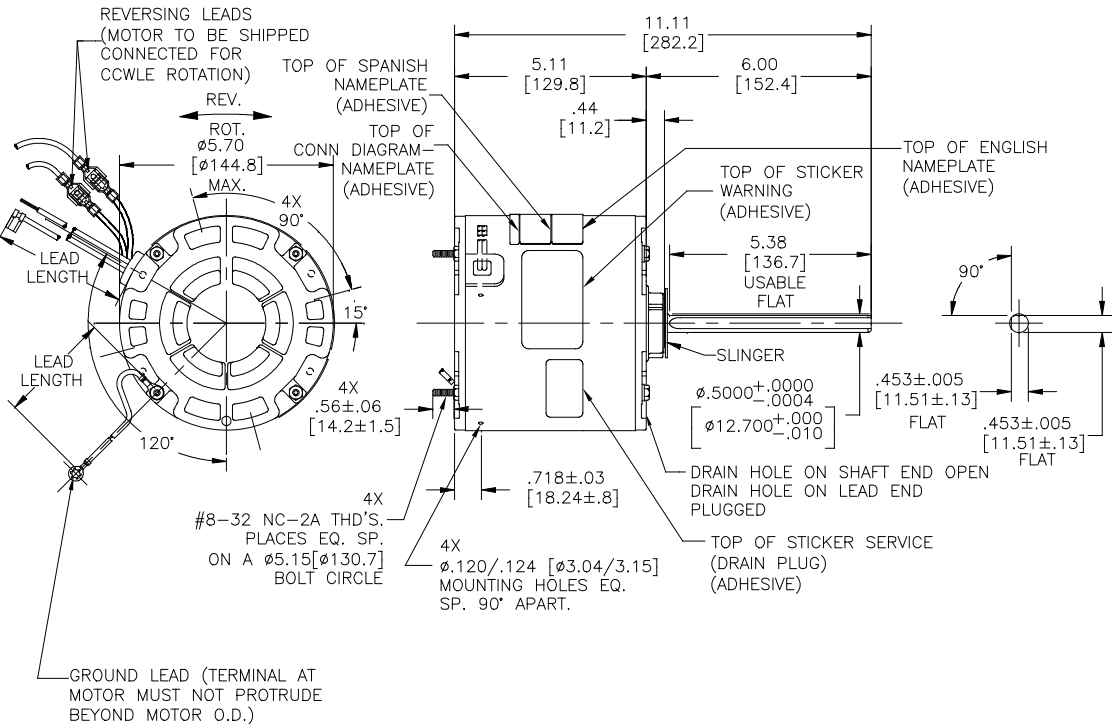
MOUNTING POSITION: ALL ANGLE

**ELECTRICAL DATA:**

OVERLOAD PROTECTOR: AUTOMATIC RESET (SENSATA 7AM 036)

LEADS: NO. 18 GA., .03[.8] THK., XLP 125°C INSUL.

GROUND LEAD: NO. 18 GA., .03[.8] THK. (GREEN) INSUL.



- NOTES:
- 4X SCREWS 615982-001 & 4X HEX NUTS 7555A19H01 TO BE PUT IN A POLYBAG.
  - THE SYMBOL OF CTQ: ▲ (NO CTQ ON THIS DRAWING).
  - MEET THE REQUIREMENT OF RoHS & REACH, SEE EP000014\_5.1.

REGAL-BELOIT CORPORATION (RBC) PROVIDES TECHNICAL ASSISTANCE TO OUR CUSTOMERS IN SEVERAL AREAS. SINCE RBC DOES NOT RECEIVE ALL DATA CONCERNING THE USE AND APPLICATION OF THE MOTOR, THE SUITABILITY OF THE MOTOR FOR THE APPLICATION MUST BE DETERMINED BY THE CUSTOMER.

DIMENSIONS WITHOUT TOLERANCES ARE FOR REFERENCE ONLY.

GREEN (GROUND)	12.0/13.0 [305/330]	#10 EYELET
PURPLE(REV)	4.0/6.0 [102/152]	.25[6.4] PER-INSUL. MALE TAB
PURPLE(REV)	4.0/6.0 [102/152]	.25[6.4] PER-INSUL. FEMALE SPADE
YELLOW (REV)	4.0/6.0 [102/152]	.25[6.4] PER-INSUL. MALE TAB
YELLOW (REV)	4.0/6.0 [102/152]	.25[6.4] PER-INSUL. FEMALE SPADE
BROWN/WHITE	35.0/37.0 [889/940]	.25[6.4] FLAG
BROWN	35.0/37.0 [889/940]	.25[6.4] FLAG
WHITE	35.0/37.0 [889/940]	.50[12.7] SKIN
BLACK	35.0/37.0 [889/940]	.50[12.7] SKIN
COLOR	LENGTH	TERMINAL OR STRIP LENGTH

MAIN FRAME - OLE	ENCLOSED
END FRAME - OLE	ENCLOSED
MAIN FRAME - LE	ENCLOSED
END FRAME - LE	ENCLOSED

CUSTOMER EconoMaster

NAMEPLATE DATA:	EXTERNAL CONNECTION DIAGRAM
MODEL NO.: F48AF36A01 CUST. P/N: EM3405F HP: 1/3 ROT.: REVERSIBLE RPM: 825 TYPE: UF FRAME: 48Y VOLTS: 208-230 PH: 1 AMPS: 1.6-1.8 HZ: 60 INS.: F AMB.: 70°C DUTY: AIR OVER CAP.: 7.5MFD/370V ENCL: ENCLOSED UL LOGO & FILE NO. CSA LOGO & FILE NO. THERMALLY PROTECTED TYPE T	<p>SEP. CAP. BROWN</p> <p>BRN/WHT</p> <p>WHITE</p> <p>BLACK</p> <p>LINE</p> <p>ROTATION AT LEAD END</p> <p>YELLOW CCW PURPLE</p> <p>YELLOW PURPLE</p> <p>YELLOW CW YELLOW</p> <p>PURPLE PURPLE</p> <p>614131-292</p>

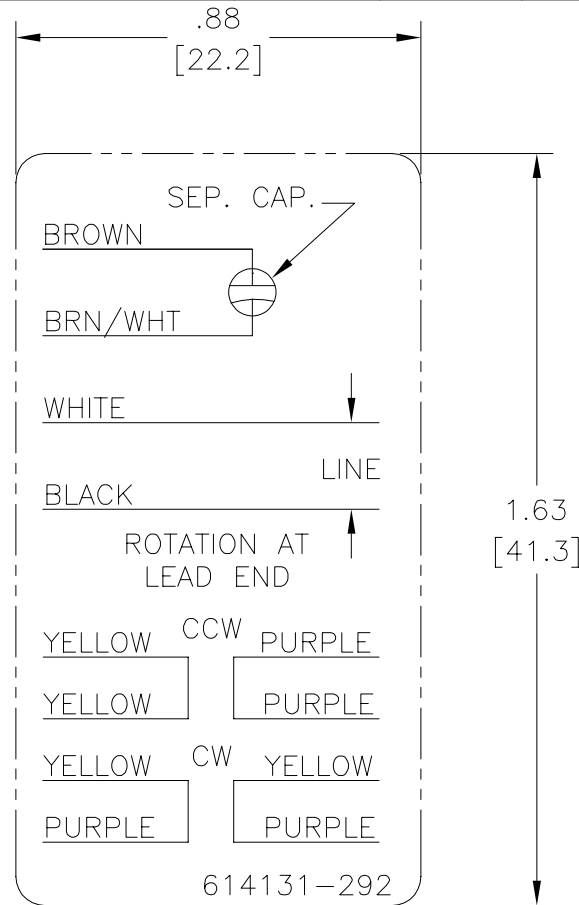
PERFORMANCE CURVE NO.	TORQUE @825 RPM (25°C)	APPROVED SAMPLE	UL COMPONENT	CSA
C30806	36.6 OZ. FT.		FILE # CCN # FILE # CLASS #	
			E46412 PRGY2 LR43341 4211-01	

DRAWING REVISION		DATE
J	NANCY LIU	06-18-2020
ECC	APPROVED BY KEYUN GONG	DATE 06-18-2020
ECO DESCRIPTION SEE ECO		
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DRAWN BY: CZ	DATE: 12-24-2012	DESCRIPTION: MODEL-RFHP-48FR OUTLINE
APPROVED BY: TZ	DATE: 12-24-2012	MATERIAL: -
PROCESS/FINISH: -	THIRD ANGLE PROJECTION	SIZE DWG NO: C
CUSTOMER: EconoMaster		SHEET: 1

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REV	ECO	REV BY	DATE	APPD	DATE
B	ECO-0022458	jrupert	09-19-2011	jrupert	09-19-2011



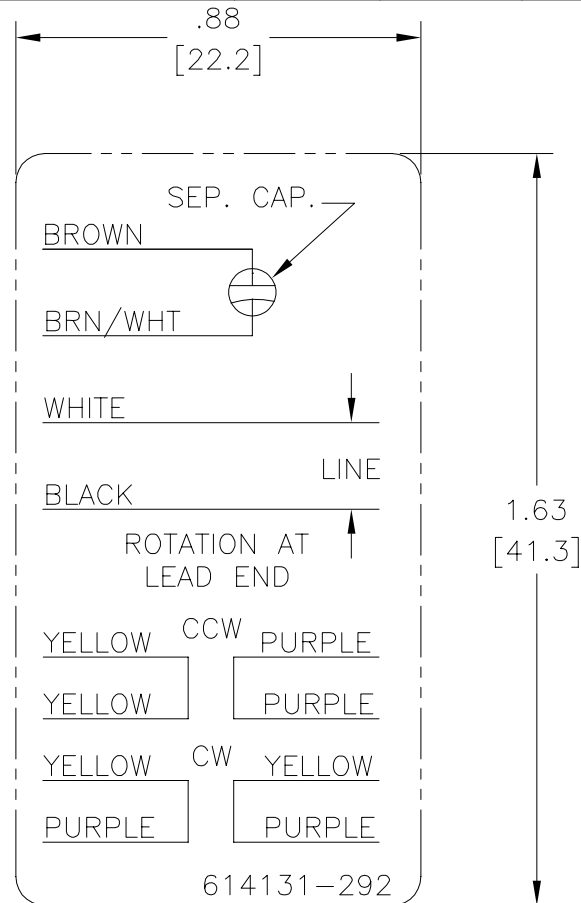
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<b>GEOMETRIC CHARACTERISTICS &amp; SYMBOLS</b> ▽ FLATNESS — STRAIGHTNESS ∠ ANGULARITY ⊥ PERPENDICULARITY (SQUARENESS) // PARALLELISM ○ ROUNDNESS (CIRCULARITY) ∅ CYLINDRICITY △ PROFILE OF ANY SURFACE ▽ PROFILE OF ANY LINE ↗ RUNOUT ⊕ TRUE POSITION ⊙ CONCENTRICITY = SYMMETRY	UNLESS OTHERWISE SPECIFIED DIM. TOLERANCES ARE AS FOLLOWS: INCH X XX XXX XXXX ±.1 ±.02 ±.005 ±.0005 mm ±0.5 ±0.13 ±0.013 ANG. ±.50 DEG REMOVE BURRS & BREAK SHARP EDGES: INCH .003-.015 mm 0.1-0.4 CORNER FILLETS TO: INCH .020 mm 0.5 MACHINE SURFACES: INCH 125 mm 3.2 METRIC DIMS. SHOWN IN [BRACKETS]	DR BY: jrupert APPD: jrupert DATE: 09-19-2011 EDS DATE 02-22-2008 FORMAT REV F THIRD ANGLE PROJECTION	DR BY: jrupert APPD: jrupert DATE: 09-19-2011 EDS DATE 02-22-2008 FORMAT REV F THIRD ANGLE PROJECTION	 <b>ELECTRICAL PRODUCTS COMPANY</b> A DIVISION OF A. O. SMITH CORPORATION	DESCRIPTION CONN DIAGRAM NAMEPLATE SIZE A DWG NO 614131-292 SCALE NONE SHEET 1
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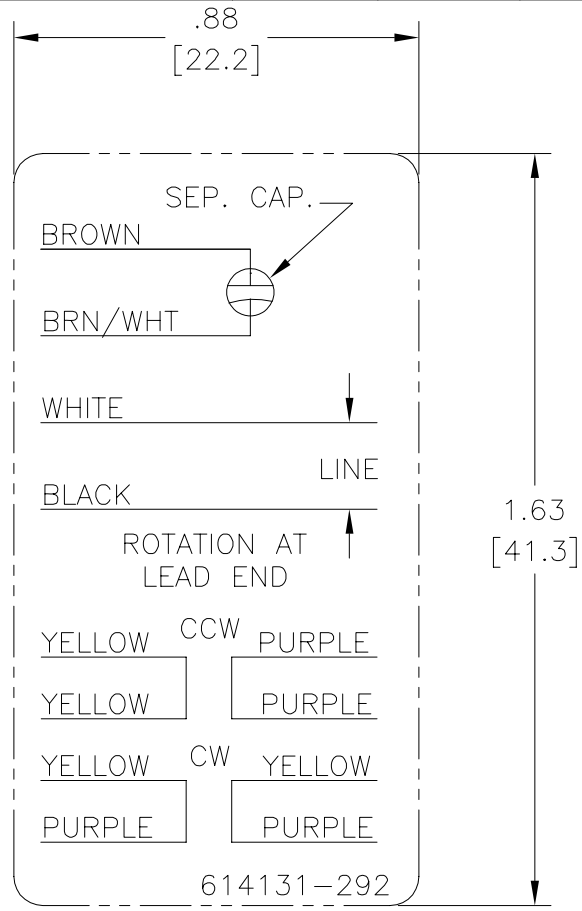
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<p><b>CARACTERISTICAS DE GEOMETRIA Y SIMBOLOS</b></p> <p>∇ PLANICIDAD</p> <p>— RECTITUD</p> <p>∠ ANGULARIDAD</p> <p>⊥ PERPENDICULARIDAD (A ESCUADRA)</p> <p>// PARALELISMO</p> <p>○ REDONDEZ (CIRCULARIDAD)</p> <p>⊘ CILINDRICIDAD</p> <p>△ PERFIL DE CUALQUIER SUPERFICIE</p> <p>∩ PERFIL DE CUALQUIER LINEA</p> <p>↑ VARIACION</p> <p>⊕ POSICION REAL</p> <p>⊙ CONCENTRICIDAD</p> <p>≡ SIMETRIA</p>	<p>A MENOS QUE SE ESPECIFIQUE DE OTRA MANERA, LAS TOLERANCIAS DE LAS DIMS. SON LAS SIGUIENTES:</p> <p style="text-align: center;">x    xx    xxx    xxxx</p> <p>PULG ±.1   ±.02   ±.005   ±.0005</p> <p>mm ±0.5   ±0.13   ±0.013</p> <p>ANG. ±.50 GRADOS</p> <p>ELIMINAR REBABAS Y ORILLAS FILOSAS DEL BORDE.</p> <p>PULG .003-.015 mm 0.1-0.4</p> <p>FILETEAR ESQUINA: PULG .020 mm 0.5</p> <p>MAQUINAR SUPERFICIES</p> <p>PULG 125 mm 3.2</p> <p>DIMS METRICAS MOSTRADAS [PARENTESIS]</p>	<p>DIBUJADO POR: jrupert</p> <p>09-19-2011</p> <p>APROBADO POR: jrupert</p> <p>09-19-2011</p> <p>TERCER ANGULO DE PROYECCION  FECHA EDS: 02-22-2008</p> <p>REV. FORMATO: F</p> <p>CONFIDENCIAL: ESTE DIBUJO Y SU INFORMACION SON PROPIEDAD DE USO EXCLUSIVO Y CONFIDENCIAL DE A.O.SMITH CORP. Y NO DEBERAN SER REVELADOS, DUPLICADOS, DISTRIBUIDOS O USARSE DE OTRA MANERA SIN EL CONSENTIMIENTO ESCRITO DE A.O. SMITH CORP.</p> <p>-TODOS LOS DERECHOS RESERVADOS.ASME Y14.5M 1994</p>	<p style="text-align: center;"><b>ACSmith</b> Innovation has a name.</p> <p style="text-align: center;"><b>ELECTRICAL PRODUCTS COMPANY</b> A DIVISION OF A. O. SMITH CORPORATION</p> <p>DESCRIPCION: <b>CONN DIAGRAM NAMEPLATE</b></p> <p>TAMAÑO: A    NUMERO DE DIBUJO: 614131-292</p> <p>ESCALA: NONE    HOJA: 1</p>
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