

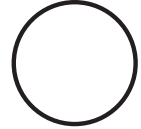
The items shown are provided as part of a total integrated Philips Gardco Solar area lighting system only. Factory quotation and factory preparation of submittals are required. Submittals apply to the factory quotation number shown above only. Contact your Philips Gardco representative for further assistance.

# Poles - Tapered Round Steel

Page 1 of 4

Solar Area Lighting System

The Philips Gardco TRS tapered round steel pole consists of a one-piece design fabricated steel tubing circumferentially welded to a structural quality hot rolled carbon steel plate. The poles are finished with an electrostatically applied, thermally cured TGIC polyester powdercoat. All poles include anchor bolts, full base cover, hand hole, ground lug and tenon.



PREFIX	HEIGHT	GAUGE	DRILLING
07TRS	20'	7	LT125230PI Solar Area Lighting System, Drilling Pattern with Top Tenon - per Drawing LT145034P2
FINISH		OPTIONS INCLUDED WITH POLE	
<b>BRP</b>	Bronze Paint	<b>OC</b>	Optional Color Paint
<b>BLP</b>	Black Paint		Specify RAL designation, ex: OC-RAL7024.
<b>WP</b>	White Paint	<b>SC</b>	Special Color Paint
<b>NP</b>	Natural Aluminum Paint		Specify. Must supply color chip.
<b>GV</b>	Galvanized (No Paint.)		
<b>FPGV</b>	Finished Paint over Galvanized (specify color.)		
		<b>AHH</b>	Additional Hand Hole - per Drawing LT145034P2
		<b>CL-3/4"</b>	1 - 1/2" Coupling - Internal thread - per Drawing LT145034P2
		<b>NL-1.25"</b>	1 - 1.25" Nipple - External thread - per Drawing LT145034P2

## POLE DATA

CATALOG #	POLE SIZE		ANCHOR BOLT DATA <sup>1</sup>	
	PREFIX - HEIGHT - GAUGE	ACTUAL HEIGHT	POLE SHAFT SIZE (inches)	BOLT CIRCLE (inches)
07TRS-20-7	20'	7.0 x 4.2	10.0	1 x 36 x 4.5
Pole is sized for the maximum load created by a 2-180W (2P180) solar panels and 1-RLS luminaire, for wind conditions of 90MPH plus a 1.3 gust factor. Consult factory for larger assemblies or higher wind conditions.				
1. Factory supplied template must be used when setting anchor bolts. Philips Gardco will not honor any claim for incorrect anchorage placement resulting from failure to use factory supplied templates.				

## SPECIFICATIONS (Continued on Page 2)

**POLE SHAFT:** The pole shaft conforms to ASTM A595 Grade-A and is supplied in 7 gauge (.180") thickness.

It is one-piece construction with a full length longitudinal high frequency resistance weld and is round in cross section having a uniform taper of 0.14 inches per foot of length.

**ANCHOR BASE:** The anchor base (base plate) is fabricated from structural quality hot rolled carbon steel plate conforming to ASTM A36. The base plate telescopes the pole shaft and is circumferentially welded top and bottom.

**ANCHOR BOLTS:** Anchor bolts are fabricated from a commercial quality hot rolled carbon steel bar with a minimum yield strength of 55,000 PSI. Bolts have an "L" bend on one end and threaded on the opposite end. Anchor bolts are hot dipped galvanized a minimum length of 12" on the threaded end. Four (4) properly sized bolts, each furnished with two (2) hex nuts and flat washers, are provided per pole, unless otherwise specified.

**BASE COVER:** A two-piece base cover completely seals the entire base plate and anchorage, secured with two (2) fasteners.

**HAND HOLE:** Poles have a 5" x 7.5" oval handhole. A nut holder is provided near the handhole and includes a .5" - 13 UNC hex head bolt and nut for grounding. The handhole is circumferentially welded in the pole shaft and includes a steel cover with attachment screws. The handhole is located 36" above the base of the pole.

**FINISH:** The standard finish for pole and accessories is an electrostatically applied, thermally cured TGIC polyester powdercoat. Prime painted poles are available.

**FASTENERS:** All structural fasteners are galvanized high strength carbon steel. All fasteners are galvanized or zinc plated carbon steel or stainless steel.

1611 Clovis Barker Road, San Marcos, TX 78666  
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GS200-003/0212

**PHILIPS**

**GARDCO**

### SPECIFICATIONS (Continued from Page 1)

**DESIGN:** The pole as designated is designed to withstand dead loads and theoretical dynamic loads developed by a 90 MPH constant wind speed with a 1.3 gust factor under the following conditions:

The luminaire(s) and/or mounting bracket(s) center of gravity is assumed to be located a maximum of 2' 6" above the pole top. For purposes of this design, their effective projected area (EPA) is considered to be the product of the actual projected area and the drag coefficient.

The charted weights include luminaire(s) and/or mounting bracket(s) and are based on an approximate weight to EPA ratio of 25 pounds per square foot.

Poles to be located in areas of known abnormal conditions may require special consideration. For example: coastal areas, airports and areas of special winds.

Poles are designed for ground-mounted applications. Poles mounted on structures (such as buildings and bridges) may also necessitate special consideration requiring Philips Gardco's recommendation.

Height correction factors and drag coefficients are applied to the entire structure. An appropriate safety factor is maintained based on the minimum yield strength of the material incorporated in the pole.

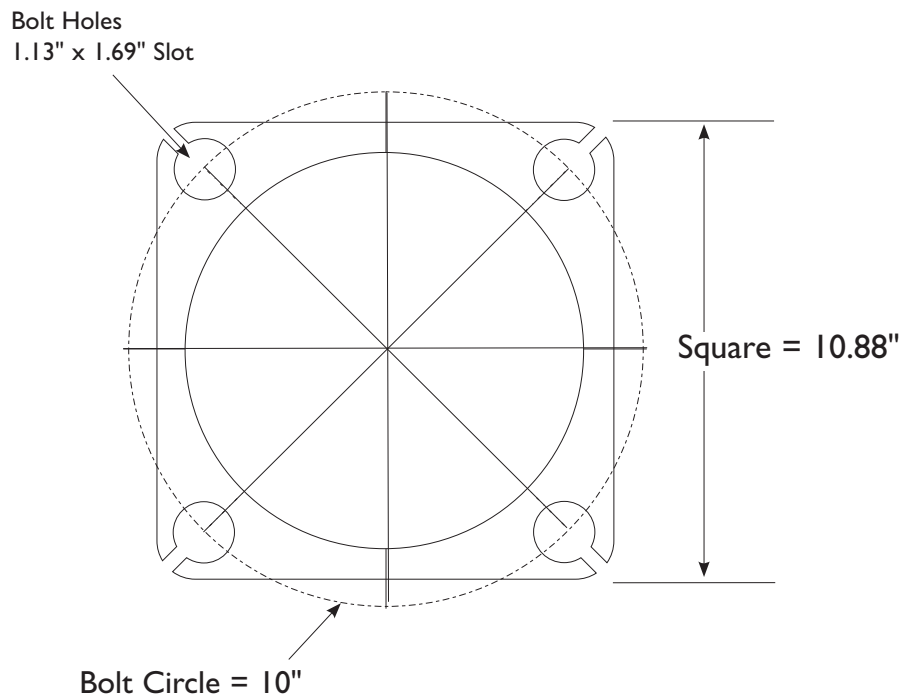
Mounting height is the vertical distance from the base of the pole to the center of the luminaire arm at the point of luminaire attachment.

For loadings other than those covered in the design section, such as overhead wiring, guying of the poles or other field installed attachments, consult the factory for recommendations.

**WARNING:** This design information is intended as a general guideline only. The customer is solely responsible for proper selection of pole, luminaire, accessory and foundation under the given site conditions and intended usage. The addition of any items to the pole, in addition to the luminaire, will dramatically impact the EPA load on that pole. It is strongly recommended that a qualified professional be consulted to analyze the loads given the user's specific needs to ensure proper selection of the pole, luminaire, accessories, and foundation. Philips Gardco assumes no responsibility for such proper analysis or product selections. **Failure to insure proper site analysis, pole selection, loads and installation can result in pole failure, leading to serious injury or property damage.**

**WARRANTY:** Philips Gardco poles feature a 1 year limited warranty. See Warranty Information on [www.sitelighting.com](http://www.sitelighting.com) for complete details and exclusions.

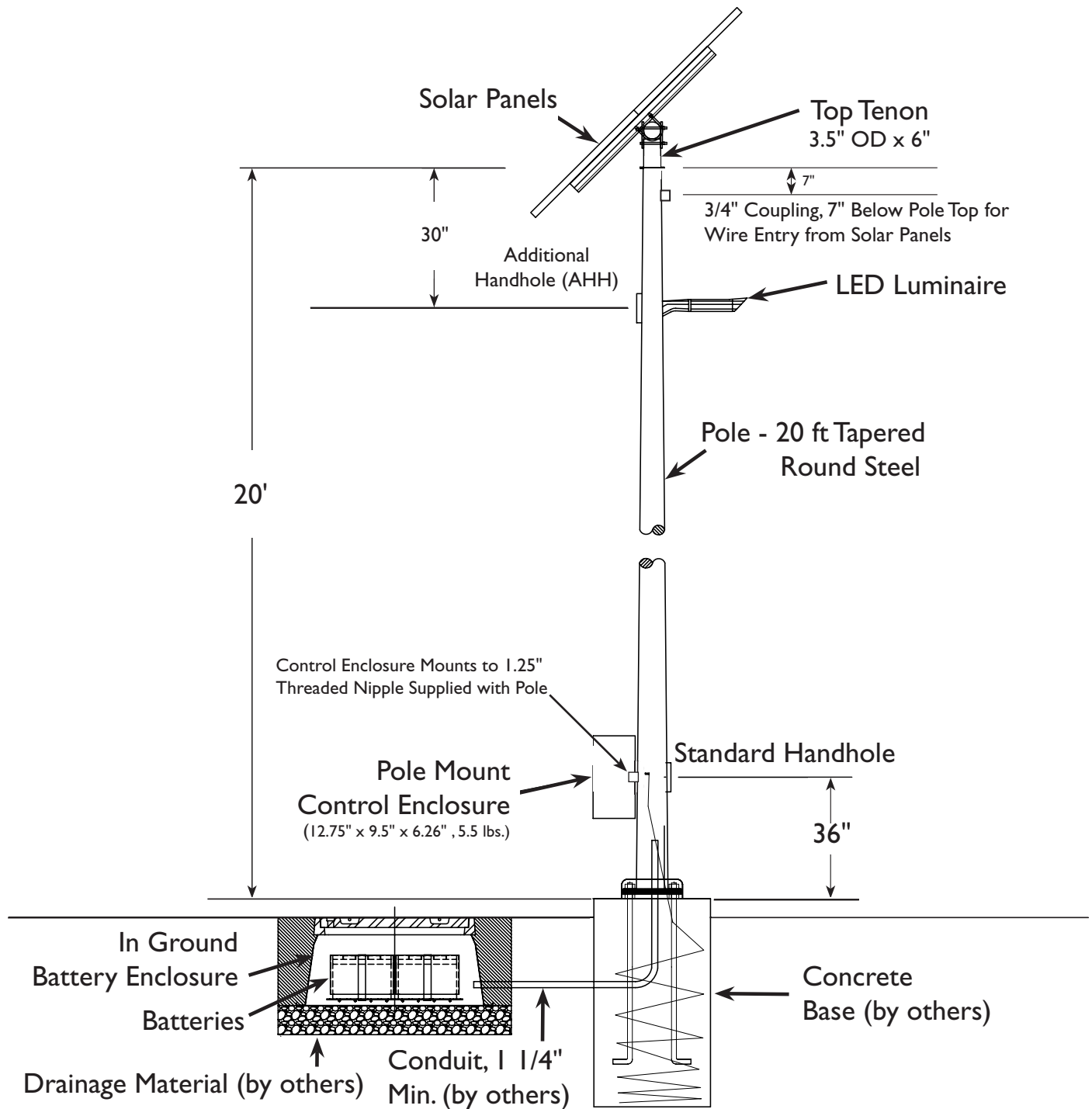
### DIMENSIONS (Continued on Page 3)





# Poles - Tapered Round Steel

### DIMENSIONS (Continued from Page 2)



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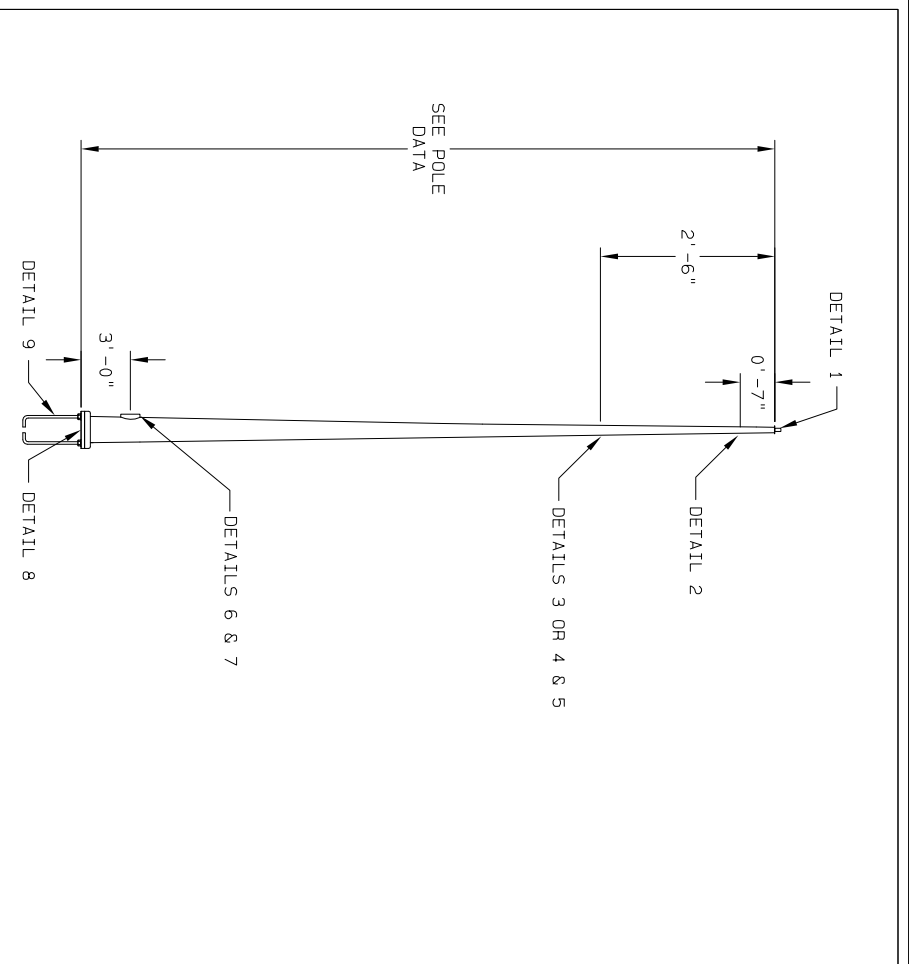
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**PHILIPS**





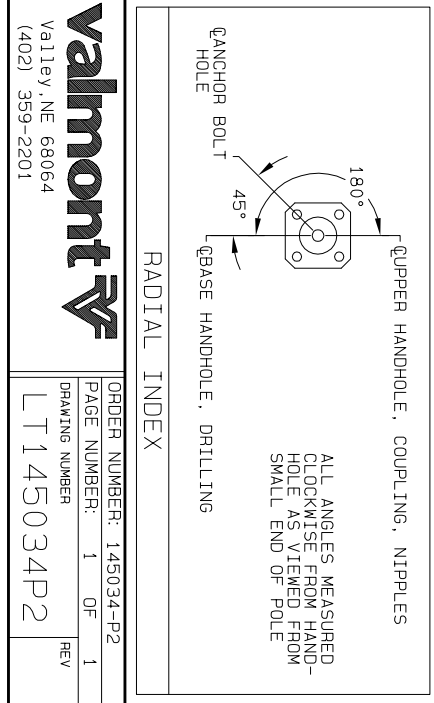
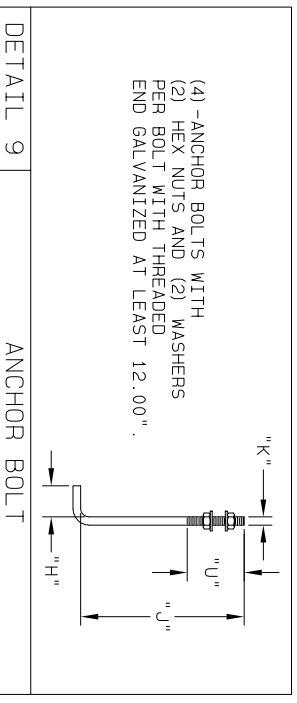
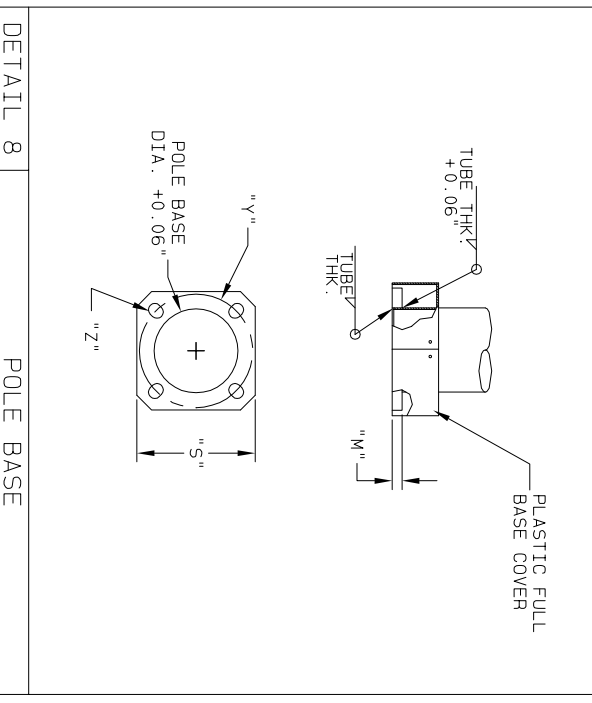
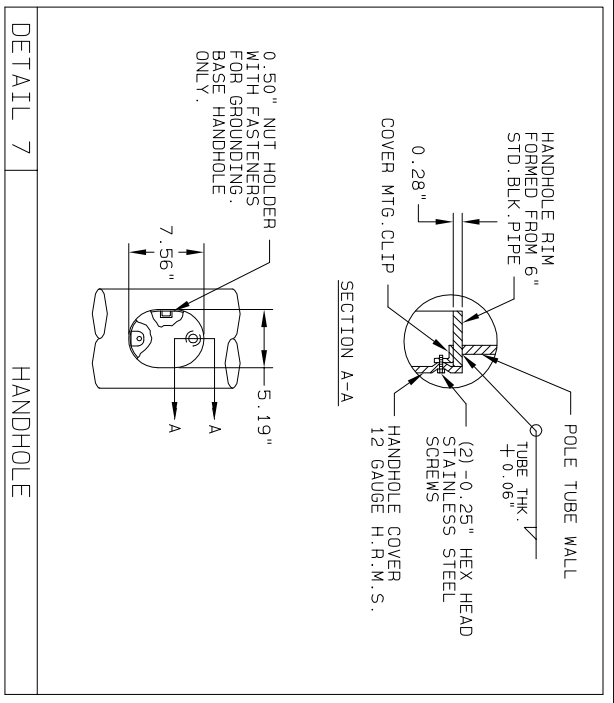
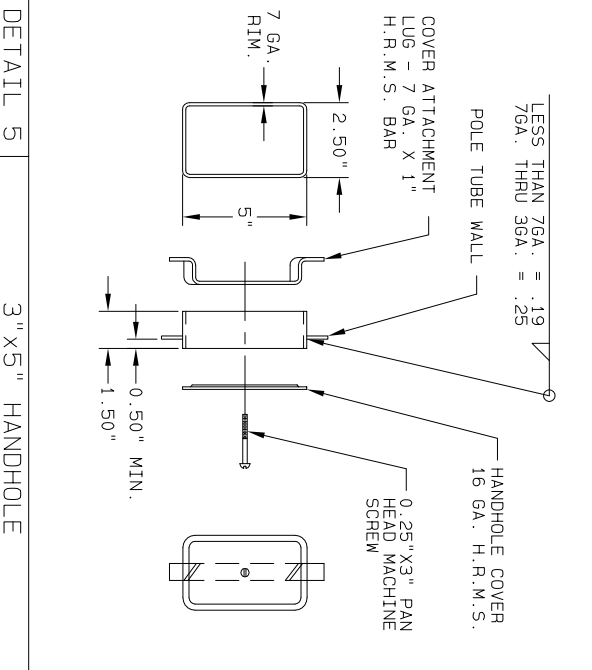
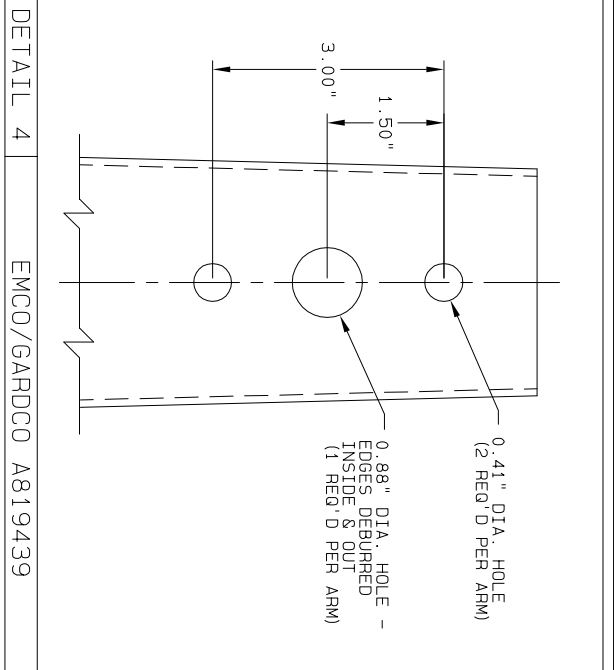
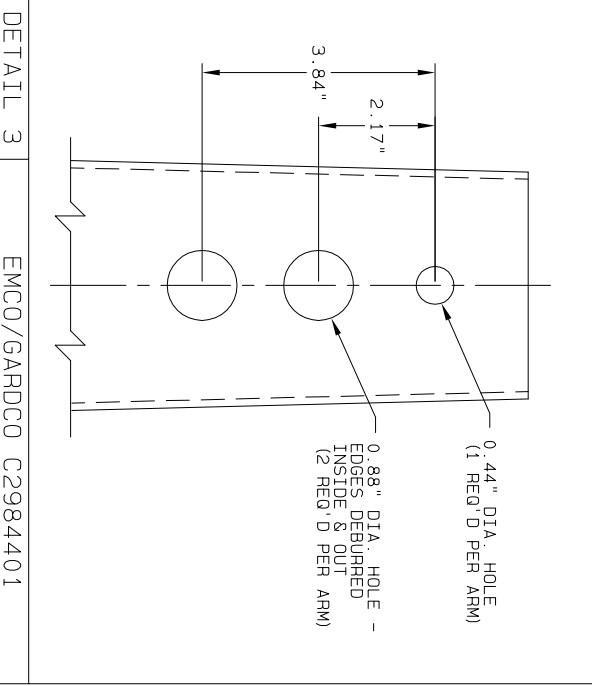
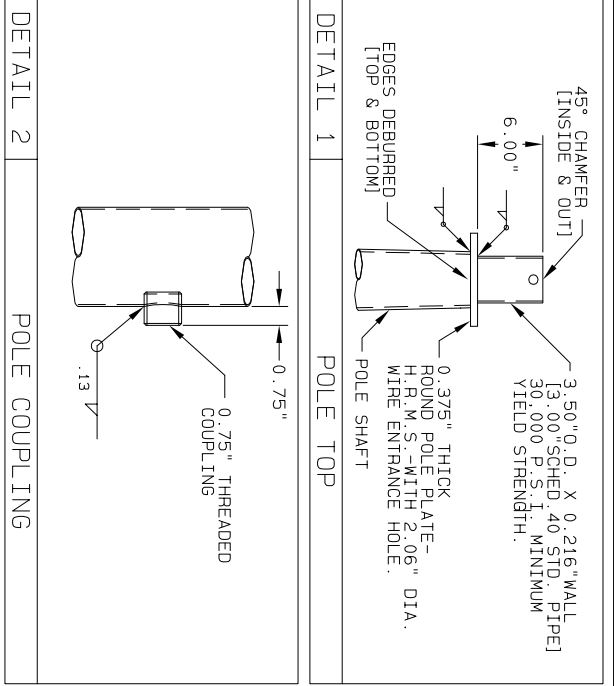
COMPONENT		ASTM DESIGNATION	MIN. YIELD (KSI)	FINISH DATA	
POLE SHAFT		A595 GR.A OR A572	55	FINISH COAT: TGIC OR URETHANE POLYESTER POWDER.	
BASE PLATE		A36	36	COLOR: TBD	
ANCHOR BOLTS		F1554 GR.55		VALMONT SPEC: F-264	
GALVANIZING-HARDWARE		A153			

ITEM	QTY.	POLE TUBE			POLE BASE			ANCHOR BOLT					
		BASE DIA. (IN)	TOP DIA. (IN)	LENGTH (FT)	GUAGE OR THK. (IN)	SQUARE "S" (IN)	BOLT CIRCLE "M" (IN)	THK. "N" (IN)	HOLE / SLOT "Z" (IN)	DIA. "K" (IN)	LENGTH "J" (IN)	HOOK "H" (IN)	THREAD LENGTH "U" (IN)
1	4	7.00	4.20	20.00	7	10.88	10.00	1.00	1.13 X 1.69	1.00	36.00	4.00	6.00

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MLRS 12/14/11	MLRS 12/14/11	
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