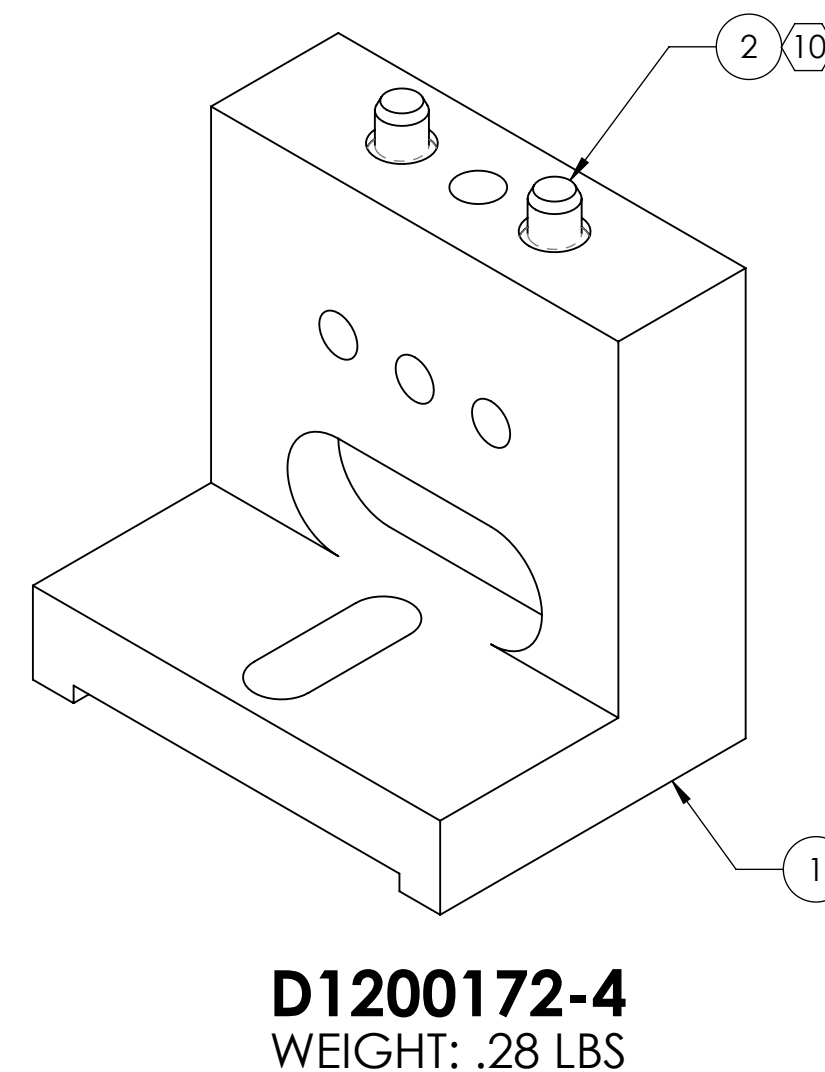
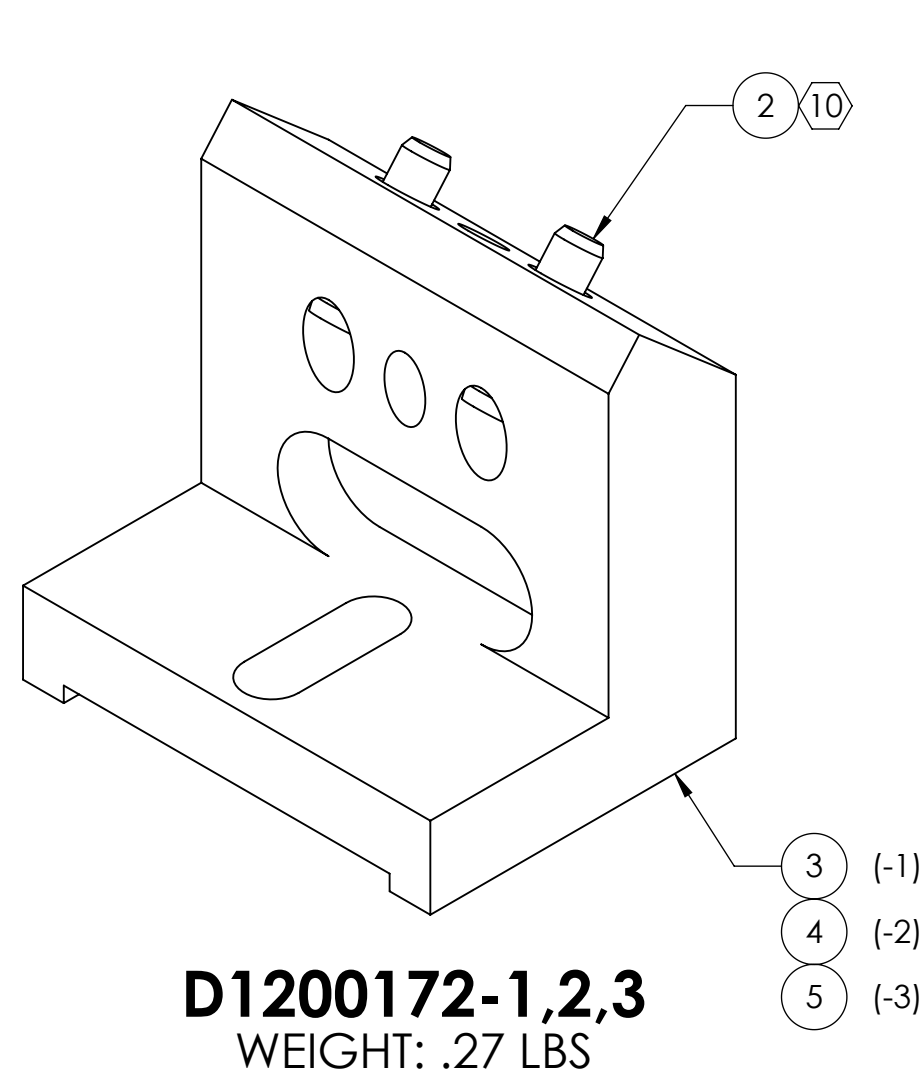


- ⑤ SCRIBE, ENGRAVE (A VIBRATORY TOOL MAY BE USED), LASER MARK OR MECHANICALLY STAMP (NO INKS OR DYES) DRAWING PART NUMBER, REVISION (AND VARIANT OR "TYPE" IF APPLICABLE) ON NOTED SURFACE OF PART FOLLOWED ON THE NEXT LINE WITH A THREE DIGIT SERIAL NUMBER. SERIAL NUMBERS START AT 001 FOR THE FIRST ARTICLE AND PROCEED CONSECUTIVELY. USE MINIMUM 0.12" HIGH CHARACTERS, UNLESS THE SIZE OF THE PART DICTATES SMALLER CHARACTERS. EXAMPLE: DXXXXXX-VY, TYPE-XX, S/N XXX
- 6. APPROXIMATE WEIGHT = SEE FIELD OF DRAWING.
- 7. ALL PARTS SHALL BE MANUFACTURED IN ACCORDANCE WITH LIGO SPECIFICATION E0900364.
- 8. MACHINE ALL SURFACES TO REMOVE OXIDES AND MILL FINISH. USE OF ABRASIVE REMOVAL TECHNIQUES IS NOT ALLOWED. REFER TO LIGO-E0900364
- 9. ALL MATERIAL IS TO BE VIRGIN MATERIAL (i.e. NO WELD REPAIRS, PLUGS OR RECYCLED MATERIAL), NO REPAIRS SHALL BE MADE UNLESS APPROVED IN ADVANCE, AND IN WRITING, BY LIGO LABORATORY. REFER TO LIGO-E0900364.
- ⑩ ITEMS ② (PIN) TO BE INSTALLED BY LIGO PERSONEL, AFTER DELIVERY OF FINISHED PARTS. USE GAUGE TOOL D1300025-v2 TO ACHIEVE PROPER PRESSED DEPTH.

REV.	DATE	DCN #	DRAWING TREE #
v1	25 OCT 2012	E1200962-V1	
v2	28 NOV 2012	E1200962-V2	
v3	17 JUL 2013	E1300602	



ITEM NO.	PART NO.	DESCRIPTION	REV.	MATERIAL	-1 QTY.	-2 QTY.	-3 QTY.	-4 QTY.
5	-3	ALIGO PCAL MIRROR MOUNT BASE, 49.38 DEG.	-	6061-T6 Al	-	-	1	-
4	-2	ALIGO PCAL MIRROR MOUNT BASE, 43.72 DEG.	-	6061-T6 Al	-	1	-	-
3	-1	ALIGO PCAL MIRROR MOUNT BASE, 40.63 DEG.	-	6061-T6 Al	1	-	-	-
2	D1300022	ALIGO PCAL PERISCOPE MIRROR ALIGNMENT PIN	v2	304, 316 OR 302 SSSL	2	2	2	2
1	-4	ALIGO PCAL MIRROR MOUNT BASE, ZERO ANGLE	-	6061-T6 Al	-	-	-	1

NOTES AND TOLERANCES: (UNLESS OTHERWISE SPECIFIED)

DIMENSIONS ARE IN INCHES  
TOLERANCES:  
.XX ± .01  
.XXX ± .005  
ANGULAR ± 0.5°

1. INTERPRET DRAWING PER ASME Y14.5-1994.  
2. REMOVE ALL SHARP EDGES, .005-.015.  
3. DO NOT SCALE FROM DRAWING.  
4. ALL MACHINING FLUIDS MUST BE FULLY SYNTHETIC, FULLY WATER SOLUBLE AND FREE OF SULFUR, SILICONE, AND CHLORINE.

**MATERIAL** AL ALLOY 6061-T6  
**FINISH** 63 μinch

**LIGO** CALIFORNIA INSTITUTE OF TECHNOLOGY  
MASSACHUSETTS INSTITUTE OF TECHNOLOGY

SYSTEM **ADVANCED LIGO** SUB-SYSTEM **AOS**

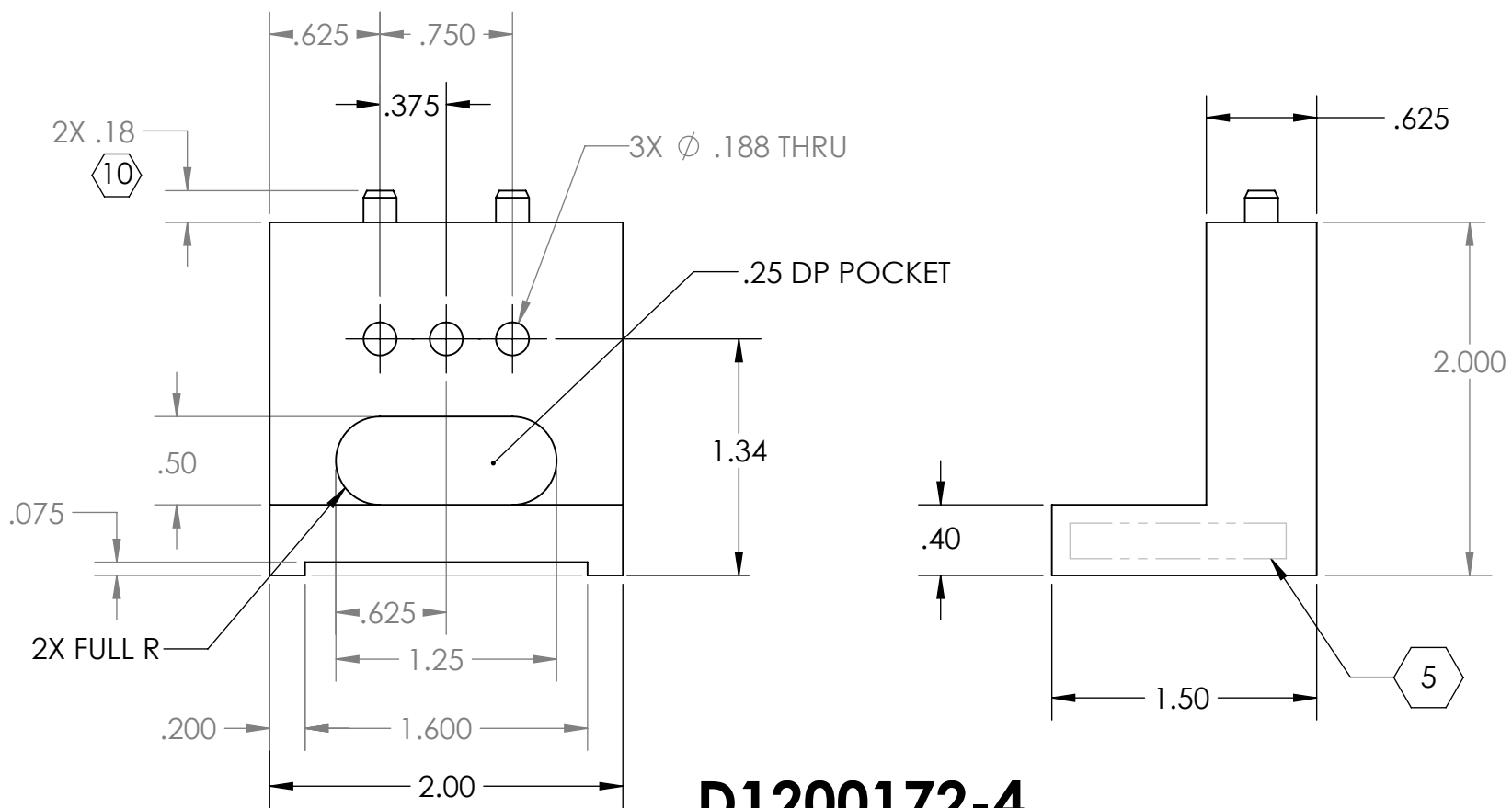
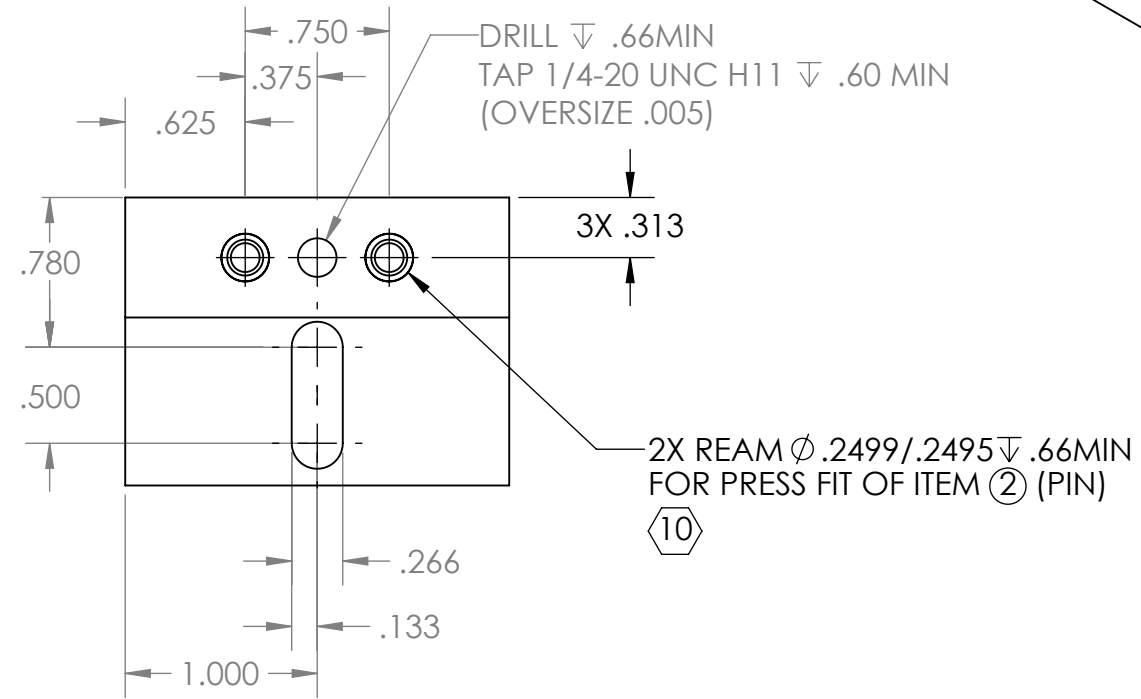
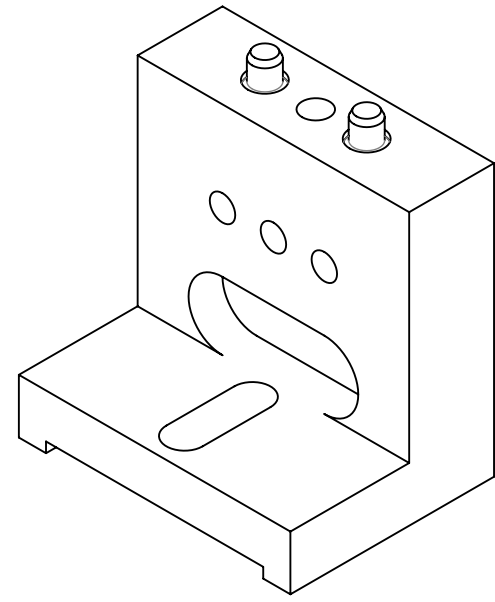
NEXT ASSY **D1200174**

PART NAME **ALIGO, PCAL, MIRROR MOUNT BASE, ETM BEAM**

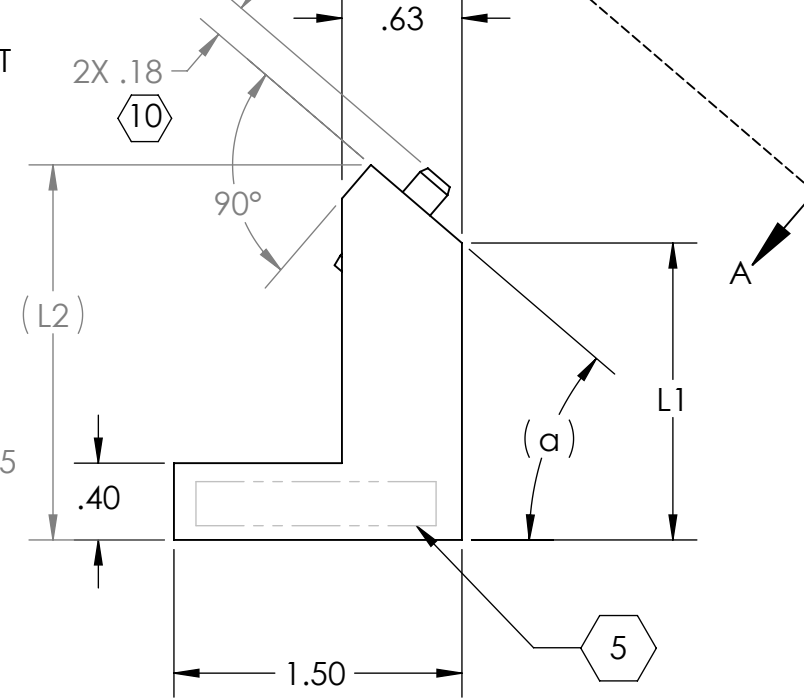
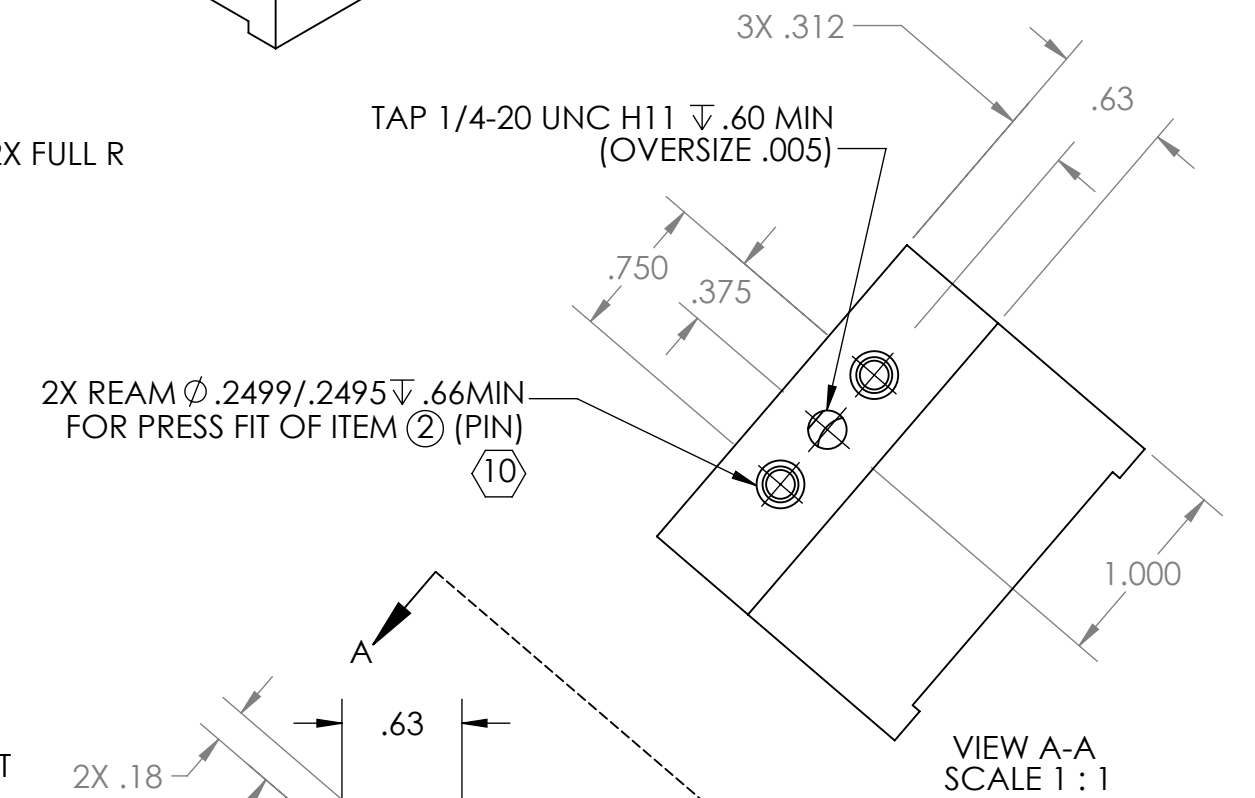
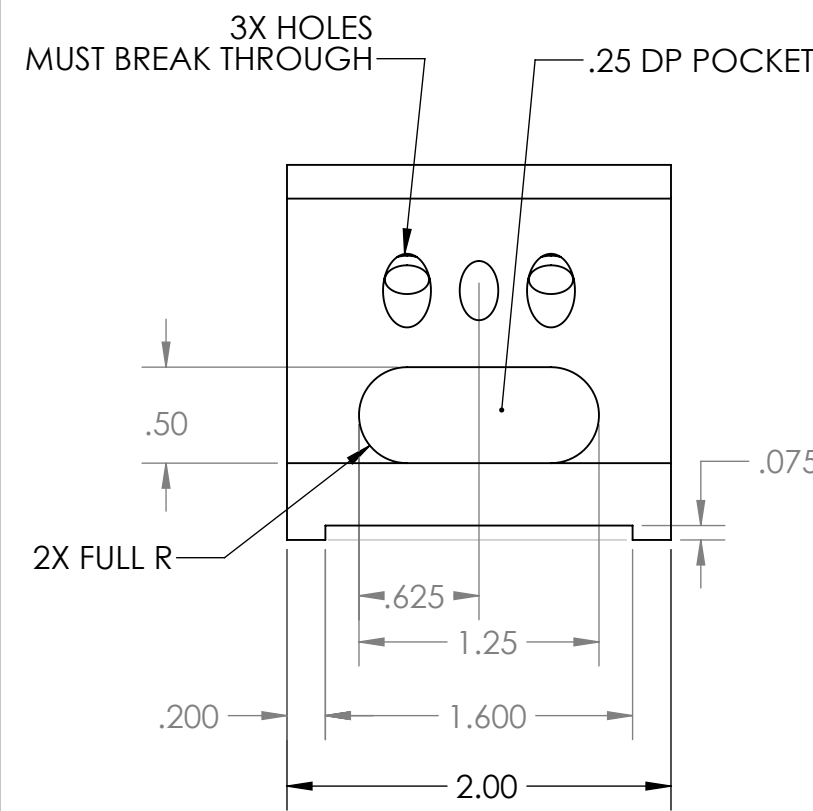
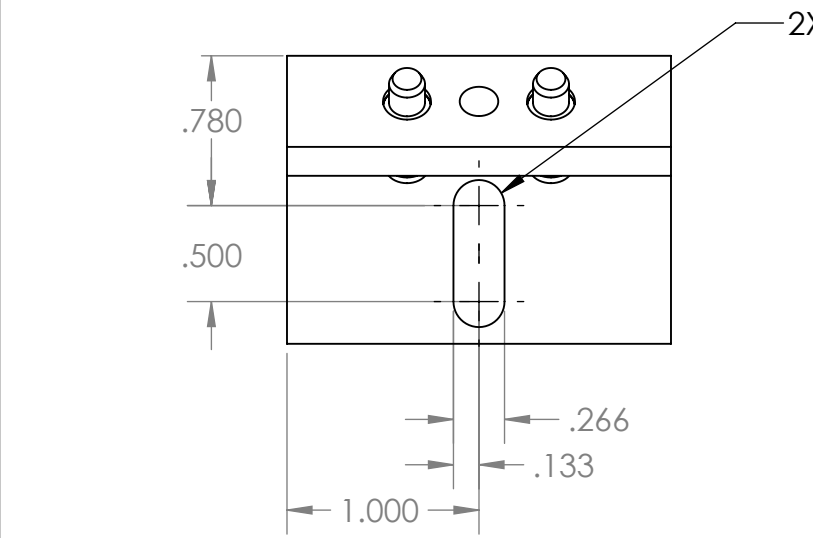
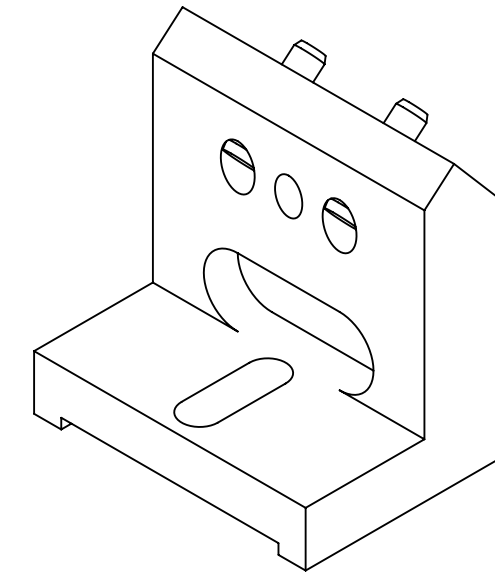
DESIGNER S. SHANKLE 25 OCT 2012  
DRAFTER S. SHANKLE 25 OCT 2012  
CHECKER S. SHANKLE 25 OCT 2012  
APPROVAL S. SHANKLE 25 OCT 2012

SIZE DWG. NO. **c D1200172** REV. **v3**

SCALE: 2:1 PROJECTION: SHEET 1 OF 2



**D1200172-4**



**D1200172-X**

P/N	"L1" in.	"L2" in.	"α" deg
D1200172-1	1.547	(1.953)	40.63
D1200172-2	1.550	(1.982)	43.72
D1200172-3	1.573	(2.047)	49.38

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SIZE	DWG. NO.	REV.
C	D1200172	v3

SCALE: 2:1    PROJECTION:    SHEET 2 OF 2