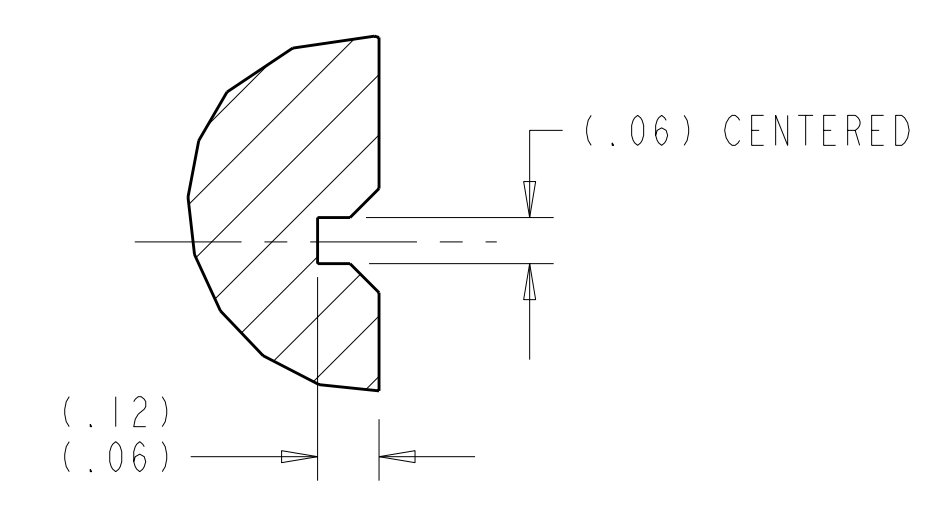
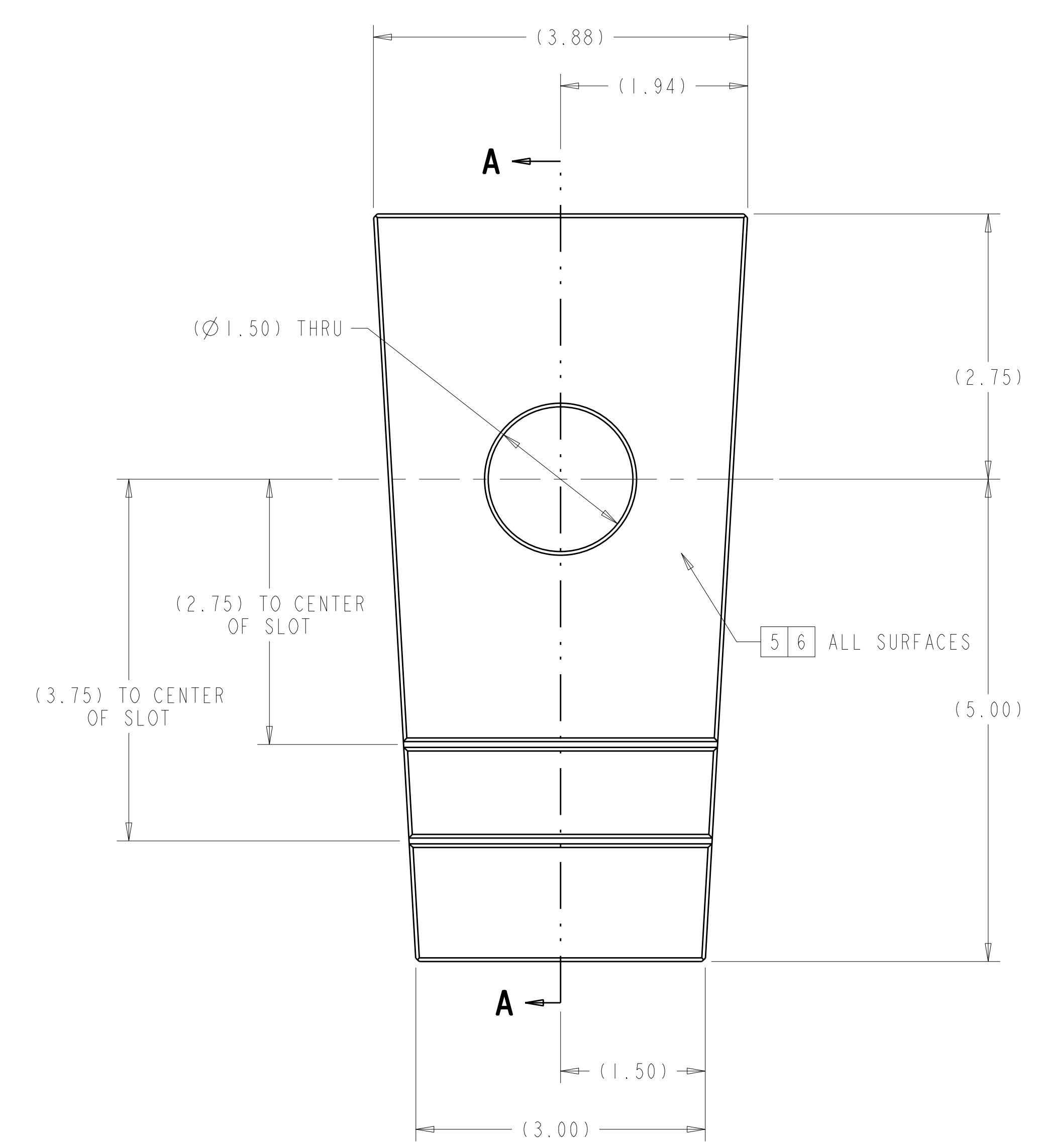


- NOTES
- DRAWING PREPARED IN ACCORDANCE WITH ASME Y14.100-2004.
  - INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-1994.
  - DIMENSIONS ARE IN INCHES
  - MAGNETIC PERMEABILITY NOT TO EXCEED 1.02 AS TESTED BY A SEVERN INDICATOR. AVAILABLE FROM:  
SEVERN ENGINEERING  
AUBURN, ALABAMA 36830  
WWW.SEVERNGINEERING.COM
  - IF PERMEABILITY SPEC IS NOT ACHIEVED THEN SOLUTION ANNEAL PART PRIOR TO COATING.
  - ALUMINA COATING PER SPECIFICATION NCSX-CSPEC-142-06-00.
  - SURFACE FINISH AFTER COATING 150-500.  
SURFACE FINISH ON NON-COATED PART 125 OR LESS UNLESS OTHERWISE SPECIFIED BY COATING SUPPLIER.

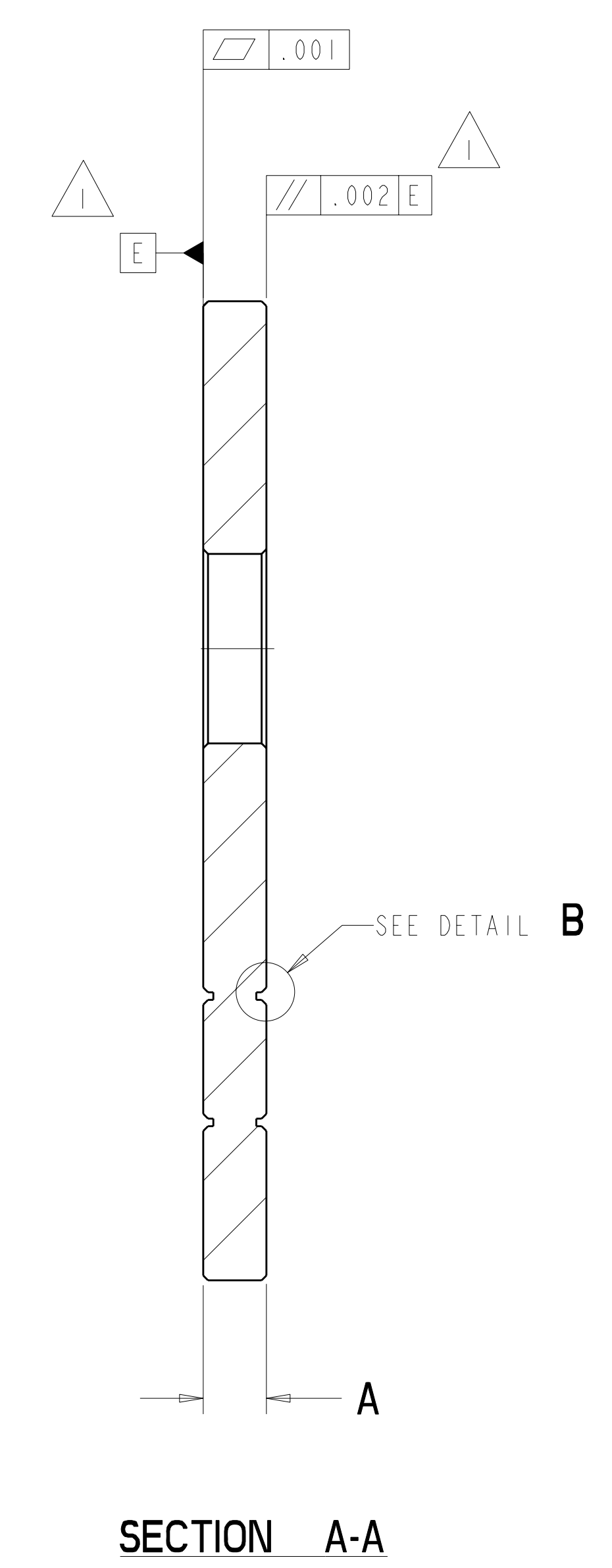


**DETAIL B**  
SCALE 4.00



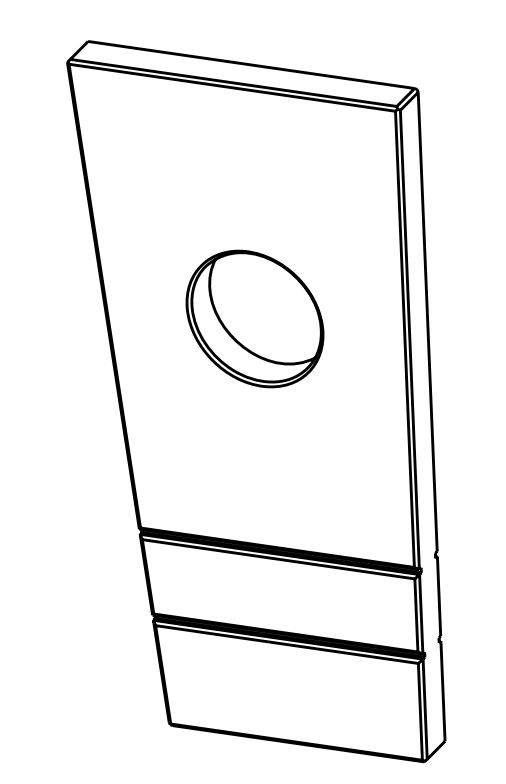
**1 SINGLE HOLE SHIM**  
SCALE 1.00

NOTE: DIMENSIONS SHOWN ON THIS SHEET APPLY AFTER COATING  
SEE SHEET 2 FOR NON-COATED PART



TOTAL 214

QTY REQ'D	DIM A FINISHED SIZE ALUMINA COATED THICKNESS PER SIDE .025 +.003 / -.002	MIN FINISHED SIZE	MAX FINISHED SIZE	THICKNESS OF SS ± .001	PART NO
1	.540	.535	.547	.490	-36
1	.538	.533	.545	.488	-35
1	.536	.531	.543	.486	-34
1	.534	.529	.541	.484	-33
2	.532	.527	.539	.482	-32
2	.530	.525	.537	.480	-31
3	.528	.523	.535	.478	-30
4	.526	.521	.533	.476	-29
5	.524	.519	.531	.474	-28
6	.522	.517	.529	.472	-27
7	.520	.515	.527	.470	-26
8	.518	.513	.525	.468	-25
9	.516	.511	.523	.466	-24
10	.514	.509	.521	.464	-23
10	.512	.507	.519	.462	-22
11	.510	.505	.517	.460	-21
12	.508	.503	.515	.458	-20
12	.506	.501	.513	.456	-19
12	.504	.499	.511	.454	-18
12	.502	.497	.509	.452	-17
11	.500	.495	.507	.450	-16
11	.498	.493	.505	.448	-15
10	.496	.491	.503	.446	-14
9	.494	.489	.501	.444	-13
8	.492	.487	.499	.442	-12
7	.490	.485	.497	.440	-11
6	.488	.483	.495	.438	-10
5	.486	.481	.493	.436	-9
4	.484	.479	.491	.434	-8
4	.482	.477	.489	.432	-7
3	.480	.475	.487	.430	-6
2	.478	.473	.485	.428	-5
2	.476	.471	.483	.426	-4
1	.474	.469	.481	.424	-3
1	.472	.467	.479	.422	-2
1	.470	.465	.477	.420	-1



**ISOMETRIC VIEW**  
SCALE .50

AR	SEE CHART	SINGLE HOLE SHIM	316 SST 4	ASTM A240	I
CAGE CODE	PART OR IDENTIFYING NO	NOMENCLATURE OR DESCRIPTION	MATERIAL	SPECIFICATION	FIND NO
SE140-044			PLASMA ALUMINA COATED 5		

**PARTS LIST**

**RELEASED FOR FABRICATION / INSTALLATION**  
PPPL Drafting:

NO REPRESENTATION OR WARRANTY, EXPRESSED OR IMPLIED, IS MADE AS TO THE ACCURACY, COMPLETENESS OR USEFULNESS OF THE INFORMATION OR STATEMENTS CONTAINED IN THESE DRAWINGS, OR THAT THE USE OR DISCLOSURE OF ANY INFORMATION, APPARATUS, METHOD OR PROCESS DISCLOSED IN THESE DRAWINGS MAY NOT INFRINGE PRIVATE RIGHTS OF OTHERS. NO LIABILITY IS ASSUMED WITH RESPECT TO THE USE OF, OR FOR DAMAGES RESULTING FROM THE USE OF, ANY INFORMATION, APPARATUS, METHOD OR PROCESS DISCLOSED IN THESE DRAWINGS. DRAWINGS MADE AVAILABLE FOR PURPOSES, AND ARE TO BE RETURNED UPON REQUEST OF THE FORWARDING CONTRACTOR.

**P** THIS DRAWING PRODUCED ON PRO-ENGINEER

REV	DESCRIPTION	BY	DATE	CHK	DEPT	DATE	PE	REQ	DATE	ORNL	DOE	DATE
1	PER ECN # 5325	GM	03/08	MC		03/08						
1	CHANGED "NEXT ASSY" TO SE140-044.											
1	ADDED DATUM F AND PARALLEL TOLERANCE SHEET 2.											
1	ADDED DATUM E AND PARALLEL TOLERANCE SHEET 1.											
0	ORIGINAL ISSUE	GM	07/07	MC		07/07	DW		07/07			

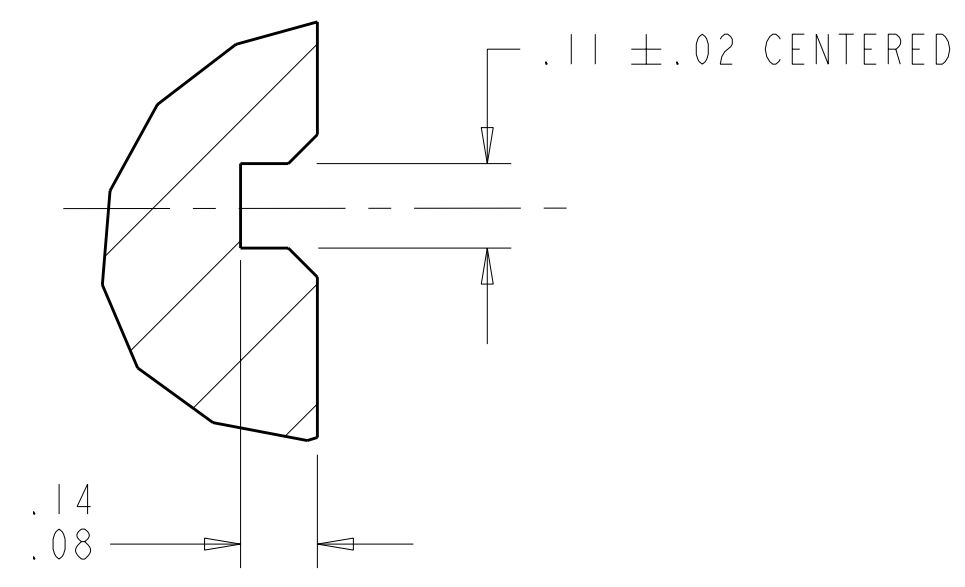
SCALE	NOTED	DES	D WILLIAMSON	07/07
	TOLERANCES UNLESS OTHERWISE SPECIFIED	DRW	G MCGINNIS	07/07
	FRACTIONS	CHK	M COLE	07/07
	XX DECIMALS ±.01	SECT		
	XXX DECIMALS ±.005	DEPT		
	ANGLES ±0°15'	PE		
	BREAK SHARP EDGES OR MAX	CR		
	FINISH .125 UNLESS OTHERWISE SPECIFIED	PJ		
		REQ		
		PPPL DRFT	J SIEGEL	07/07

VERSION NO.	PLANT	BLDG	FL	SHT	OF	TYPE	CLASS
6	ORNL	5700	3	1	2	S	U

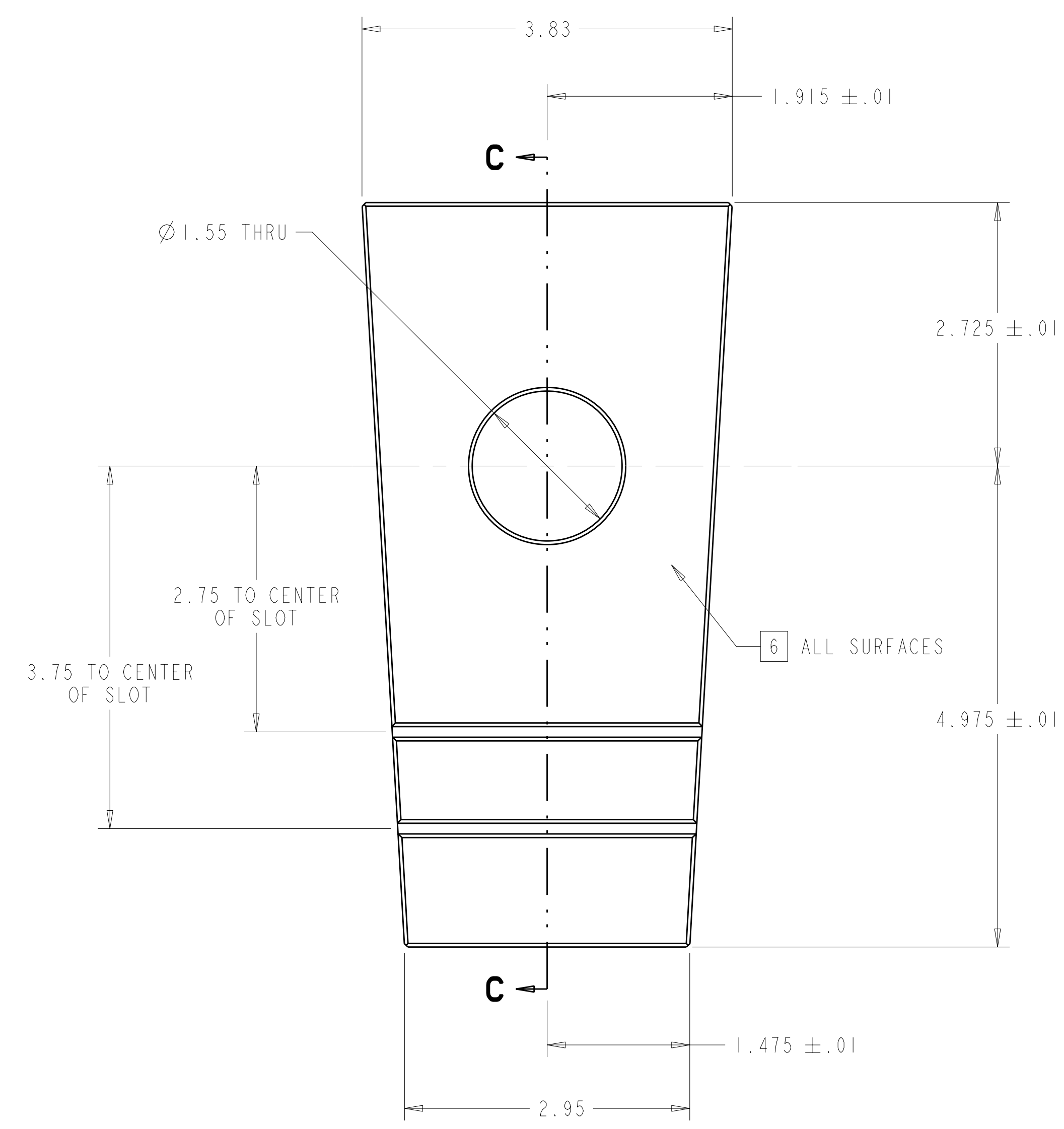
**SINGLE HOLE SHIM PLATE**

RELEASE LEVEL: Fabrication

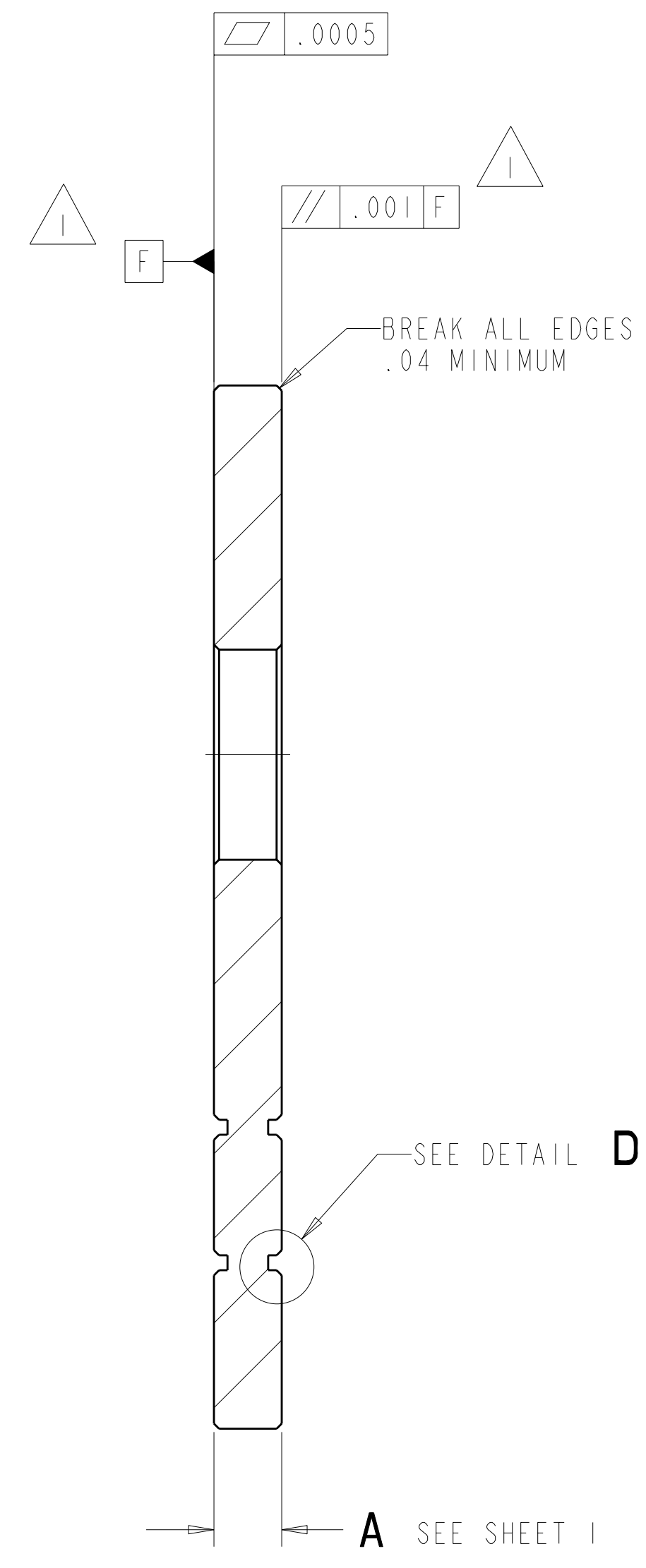
SE140-040



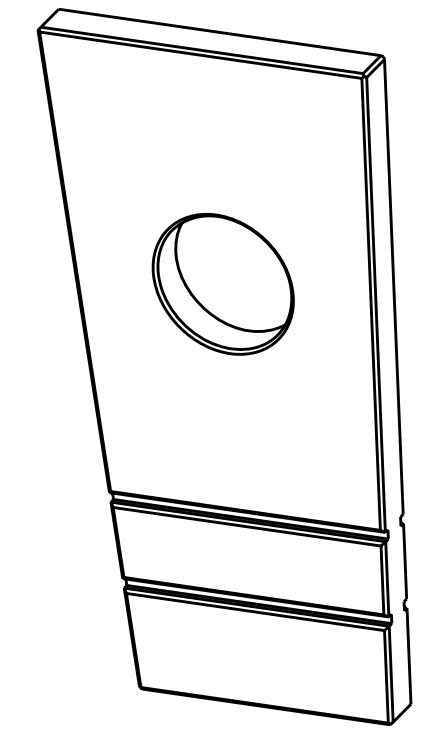
**DETAIL D**  
SCALE 4.00



SCALE 1.00



**SECTION C-C**



**ISOMETRIC VIEW**  
SCALE 0.50

NOTE: DIMENSIONS SHOWN ON THIS SHEET ARE FOR NON-COATED PART  
SEE SHEET 1 FOR ADDITIONAL NOTES AND SPECIFICATIONS

**RELEASED FOR FABRICATION / INSTALLATION**  
PPPL Drafting:

Oak Ridge National Laboratory managed for the DEPARTMENT OF ENERGY under U.S. GOVERNMENT contract DE-AC05-00OR22725 UT-BATTELLE, LLC. Oak Ridge, Tennessee PROJECT NAME:									
<b>UT-BATTELLE</b>									
<b>NATIONAL COMPACT STELLARATOR EXPERIMENT</b>									
<b>SINGLE HOLE SHIM PLATE</b>									
VERSION NO.	PLANT	BLDG	FL	SHT	OF	TYPE	CLASS		
6	ORNL	5700	3	2	2	S	U		
RELEASE LEVEL		SE140-040						REV	
Fabrication								1	