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LAYER STACKUP :

Layer	Name	Material	Thickness	Constant	Board Layer Stack
1	Top Overlay				
2	Top Solder	Solder Resist	0.80mil	3.5	
3	TOP	Copper	1.60mil		
4	Dielectric 1	RO4835 LOPRO	4.00mil	3.66	
5	L2	Copper	1.20mil		
6	Dielectric2	FR4 370HR	2.85mil	3.9	
7	Dielectric 3	FR4 370HR	2.85mil	3.9	
8	L3	Copper	1.20mil		
9	Dielectric4	FR4 370HR	28.00mil	4.36	
10	L4	Copper	1.20mil		
11	Dielectric5	FR4 370HR	2.92mil	3.9	
12	Dielectric 6	FR4 370HR	2.92mil	3.9	
13	L5	Copper	1.20mil		
14	Dielectric7	FR4 370HR	4.00mil	4.26	
15	BOTTOM	Copper	1.60mil		
16	Bottom Solder	Solder Resist	0.80mil	3.5	
17	Bottom Overlay				

NOTE :
EXTERNAL LAYER CU THICKNESSES ARE FINISHED THICKNESS AFTER PLATING.

THIS IS AN IMPEDANCE CONTROLLED BOARD.

DRILL CHART :

Symbol	Count	Hole Size	Plated	Hole Type	Hole Length	Routed Path Length	Drill Layer Pair	Hole Tolerance
B	15	7.87mil (0.200mm)	PTH	Round	-	-	TOP - BOTTOM	+0.00mil/-7.87mil
C	621	12.20mil (0.310mm)	PTH	Round	-	-	TOP - BOTTOM	+0.00mil/-12.20mil
D	2	23.62mil (0.600mm)	PTH	Slot	51.18mil (1.300mm)	27.56mil (0.700mm)	TOP - BOTTOM	+/-3.00mil
E	2	33.47mil (0.850mm)	PTH	Round	-	-	TOP - BOTTOM	+/-3.00mil
V	2	39.37mil (1.000mm)	PTH	Slot	118.11mil (3.000mm)	78.74mil (2.000mm)	TOP - BOTTOM	+/-3.00mil
O	1	39.37mil (1.000mm)	PTH	Slot	137.80mil (3.500mm)	98.43mil (2.500mm)	TOP - BOTTOM	+/-3.00mil
H	8	40.00mil (1.016mm)	PTH	Round	-	-	TOP - BOTTOM	+/-3.00mil
J	2	40.16mil (1.020mm)	NPTH	Round	-	-	TOP - BOTTOM	+/-2.00mil
I	5	40.16mil (1.020mm)	PTH	Round	-	-	TOP - BOTTOM	+/-3.00mil
K	3	47.24mil (1.200mm)	PTH	Round	-	-	TOP - BOTTOM	+/-3.00mil
L	2	157.48mil (4.000mm)	PTH	Round	-	-	TOP - BOTTOM	+/-3.00mil
□	4	160.00mil (4.064mm)	NPTH	Round	-	-	TOP - BOTTOM	+/-2.00mil
	667 Total							

Slot definitions : Routed Path Length = Calculated from tool start centre position to tool end centre position.
Hole Length = Routed Path Length + Tool Size = Slot length as defined in the PCB layout

142.50mil

3077.25mil

102.75mil

2402.50mil

4x R 70mil

(0,0)

ALL ARTWORK VIEWED FROM TOP SIDE

BOARD # : PROC010

REV: B

SUN REV: Not In VersionControl

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5 IMPEDANCE TABLE :

LAYER NO	CONDUCTOR WIDTH	DIFF. PAIR SPACING	CPWG SPACING	IMPEDANCE +/-10%	REFERENCE GND
1 (TOP)	7.08mil	N/A	6.73mil	50ohm	GND
1 (TOP)	5.2mil	5mil	N/A	100ohm	GND

DESIGN INFORMATION

MIN. TRACK WIDTH: 3.9 MIL
MIN. CLEARANCE: 3.9 MIL
MIN. VIA PAD SIZE: 13.27MIL
MINIMUM ANNULAR RING 0.05mm (2MIL) EXTERNAL
PER IPC-D-275 CLASS 2 LEVEL C
REGISTRATION TOLERANCES: METAL +/- 2 MIL, HOLES +/- 3 MIL
HOLE SIZE TOLERANCE (UNLESS OTHERWISE SPECIFIED): +/- 3 MIL

MATERIAL:
☐ FR-408 ☐ FR-4 High Tg ☒ OTHER REFER STACKUP
THICKNESS: ☐ 62 MIL (1.6mm) +/-10% ☒ OTHER 57.14 MIL +/-10%
TOLERANCE: ☒ ANSI IPC-6012 TYPE 3 CLASS 2
☐ OTHER +/-
BOW & TWIST: ☒ ANSI IPC-6012 TYPE 3 CLASS 2
☐ OTHER +/-

DRILLING:
REFERENCE: ☒ AS SHOWN ☒ NC_DRILL FILES
PTH COPPER THICKNESS: ☒ 20-30 um ☐ OTHER

BOARD FINISH:
SILKSCREEN: ☒ TOP ☐ BOTTOM
SILKSCREEN COLOR: ☒ WHITE ☐ OTHER
SOLDER RESIST COLOR: ☐ GREEN ☒ OTHER REFER NOTE 8
☒ MATTE ☐ SEMI-GLOSS

SURFACE FINISH: ☐ IMMERSION GOLD (ENG) ☐ ENERPIC
☐ IMM. TIN/SILVER OR EQUIV ☒ OTHER REFER NOTE 7
ARRAY/PANEL: ☐ CUT AND TRIM PER M1 BOARD OUTLINE
☐ N.C. ROUTE ☒ V. SCORE
CERTIFICATION: MATERIALS AND WORKMANSHIP FOR ALL PCBs TO MEET OR EXCEED THE REQUIREMENTS OF:
☒ ANSI IPC-A-600F CLASS -> ☐ 1 ☒ 2 ☐ 3
☒ RoHS ☐ OTHER PER ORDER

ALL BOARDS MUST MEET OR EXCEED UL94-V0 REQUIREMENTS.
PCB MUST BEAR THE UL94V-0 UL REGISTERED MATERIAL ID NUMBER

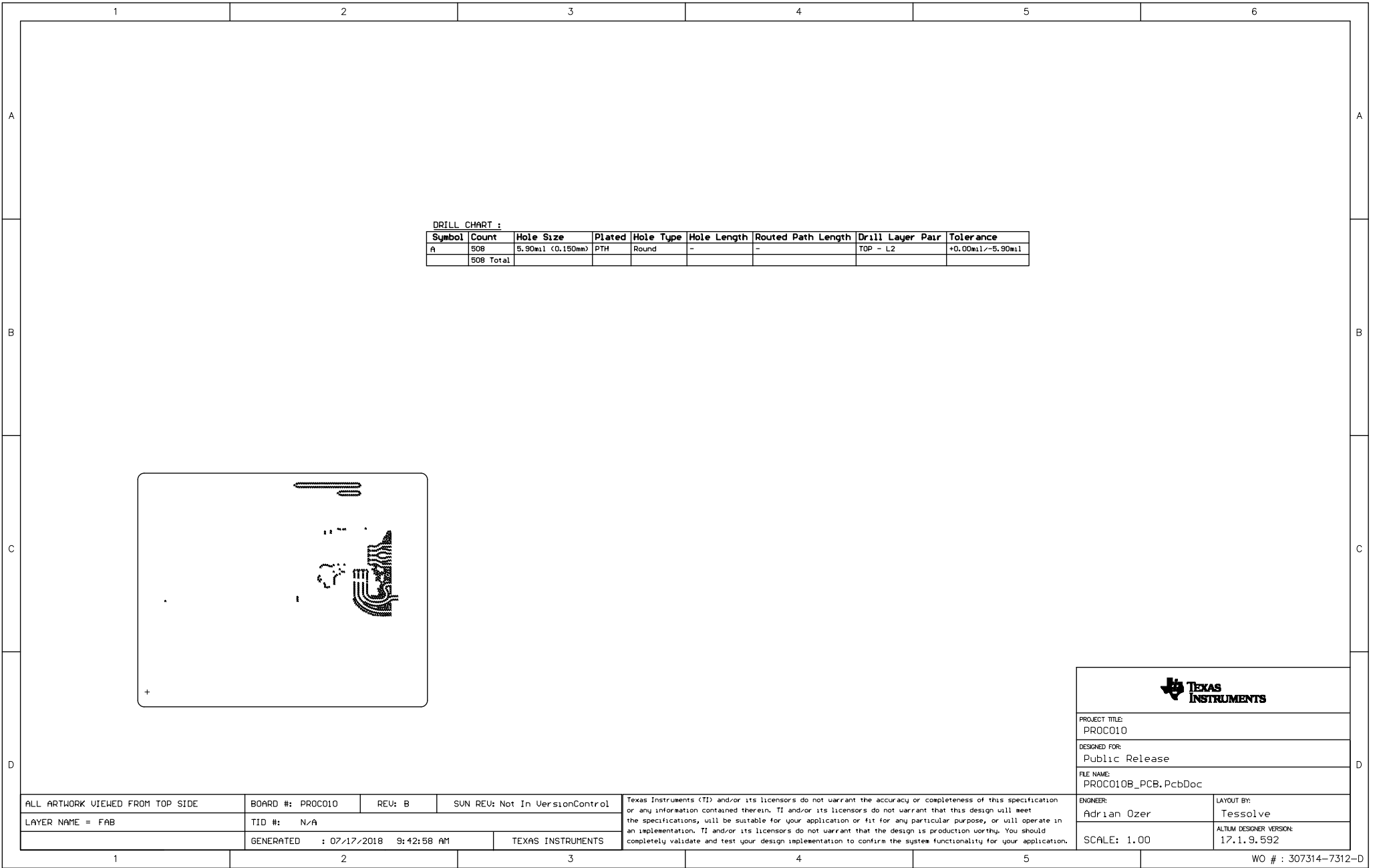
ADDITIONAL REQUIREMENTS:
MICROSECTION: ☐ YES
BARE BOARD ELEC. TEST: ☐ NONE ☒ REQUIRED ☐ PER ORDER
☐ XX MIL VIAS REQUIRE NON-CONDUCTIVE FILL AND PLANARIZE
☐ XX MIL VIAS REQUIRE CONDUCTIVE FILL AND PLANARIZE
☐ OUTER XX MIL TRACES REQUIRE 50 OHM SINGLE-ENDED IMPEDANCE
☐ LAYER 2 & 3 (INNER LAYERS) XX MIL WIDE, XX MIL SPACE
TRACES REQUIRE 100 OHM DIFFERENTIAL IMPEDANCE

TEXAS INSTRUMENTS

PROJECT TITLE:
PROC010
DESIGNED FOR:
Public Release
FILE NAME:
PROC010B_PCB.PcbDoc

ENGINEER:
Adrian Ozer
SCALE: 1.00
LAYOUT BY:
Tessolve
ALTIM DESIGNER VERSION:
17.1.9.592

WO # : 307314-7312-D



DRILL CHART :

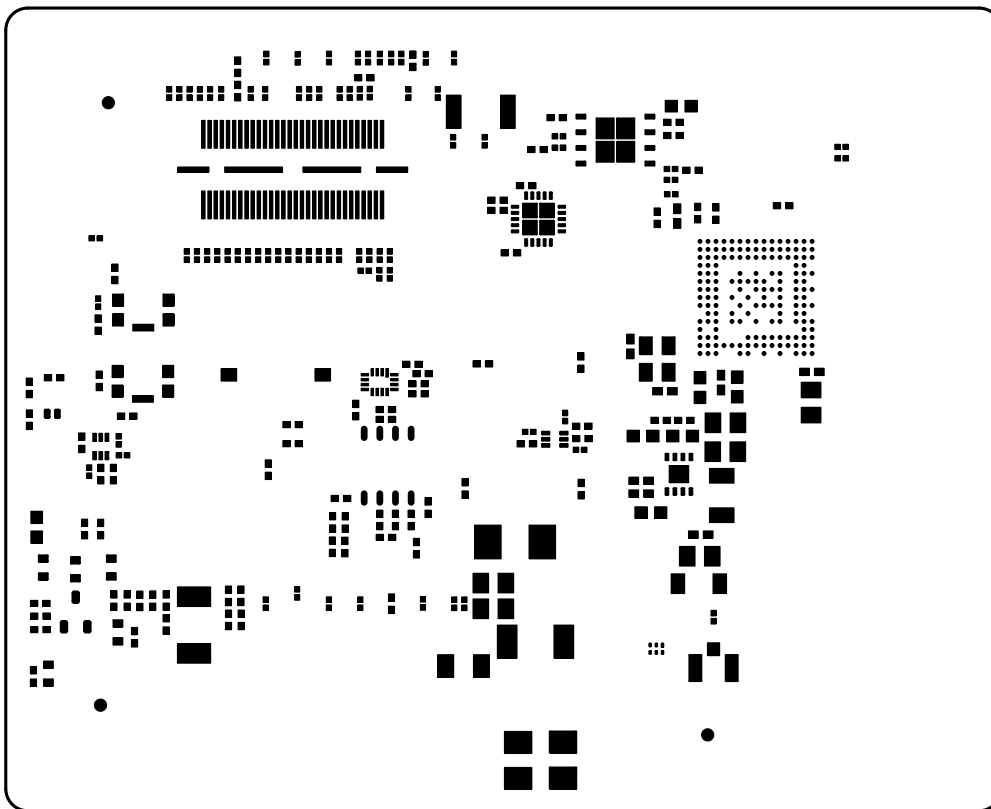
Symbol	Count	Hole Size	Plated	Hole Type	Hole Length	Routed Path Length	Drill Layer Pair	Tolerance
A	508	5.90mil (0.150mm)	PTH	Round	-	-	TOP - L2	+0.00mil/-5.90mil
	508 Total							



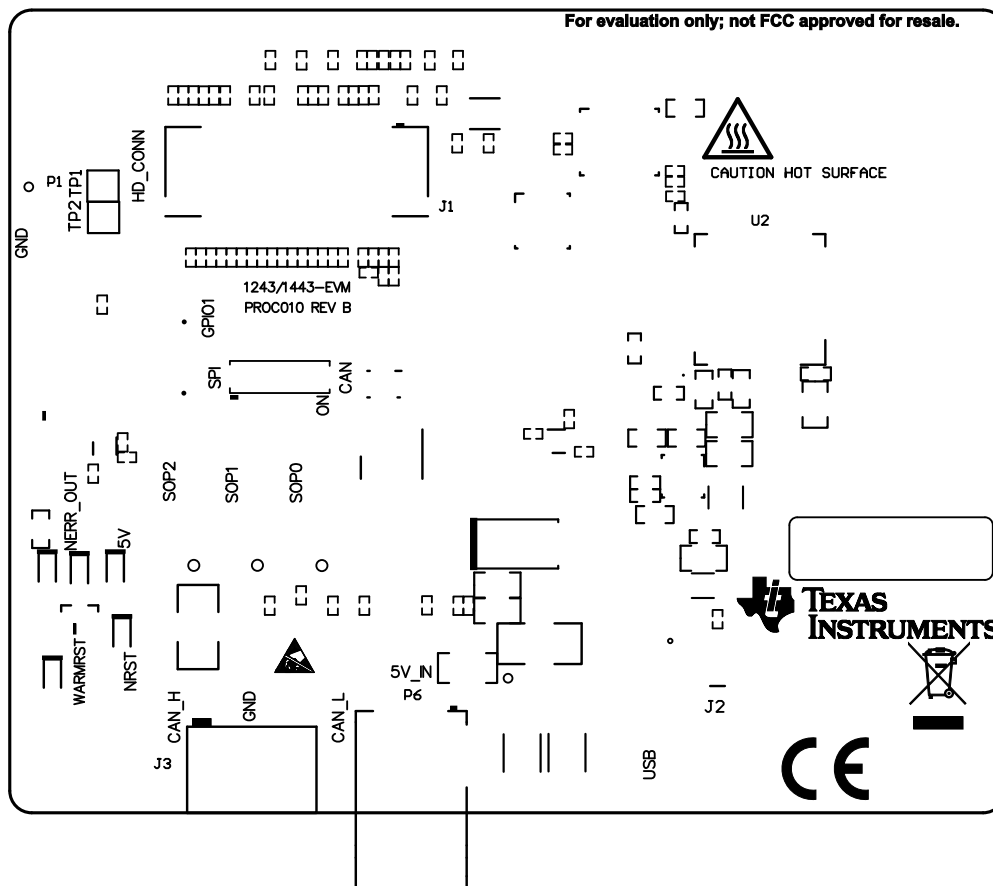
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DESIGNED FOR: Public Release	
FILE NAME: PROC010B_PCB.PcbDoc	
ENGINEER: Adrian Ozer	LAYOUT BY: Tessolve
SCALE: 1.00	ALTUM DESIGNER VERSION: 17.1.9.592

ALL ARTWORK VIEWED FROM TOP SIDE	BOARD #: PROC010	REV: B	SUN REV: Not In VersionControl
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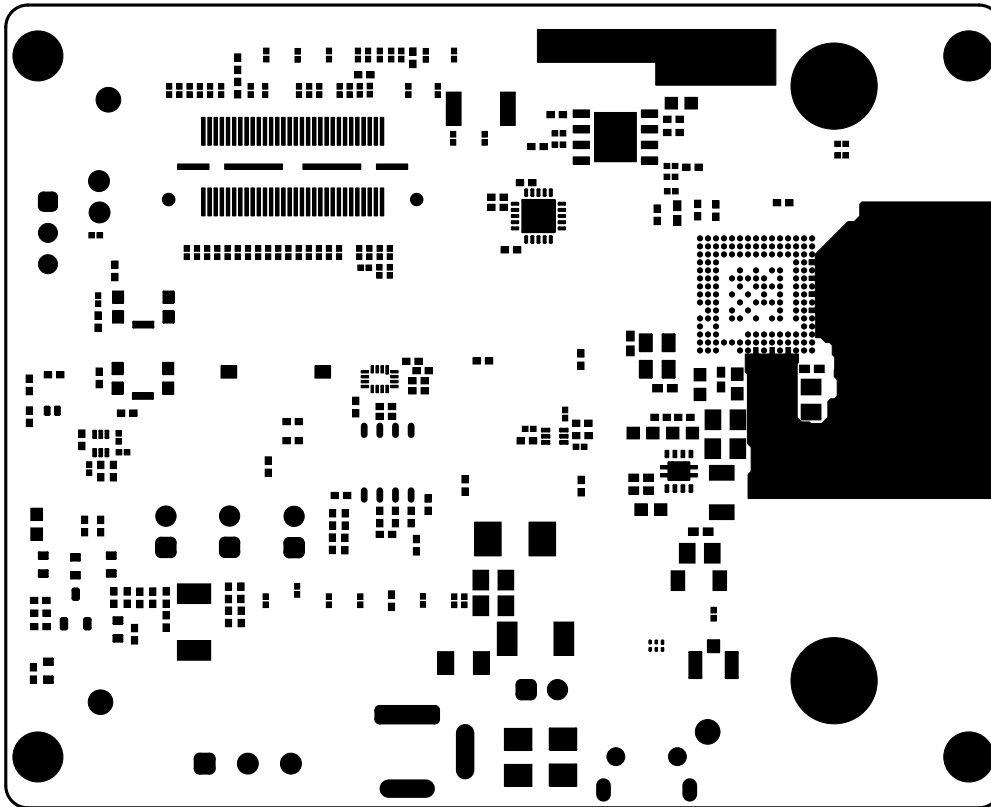
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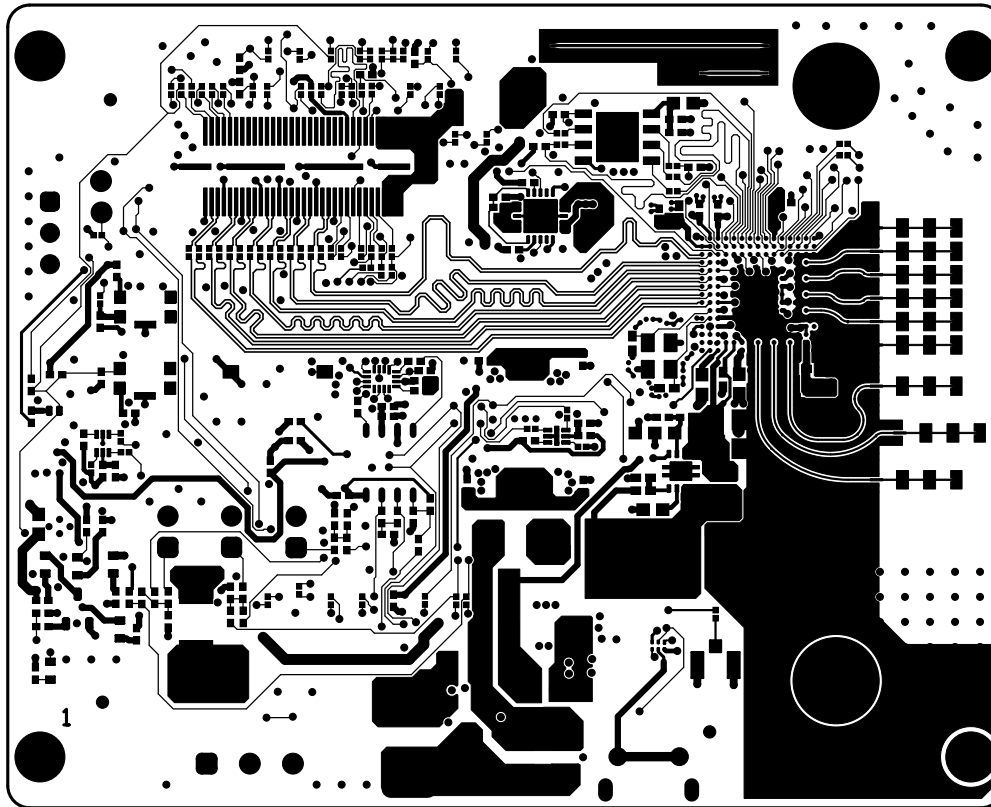
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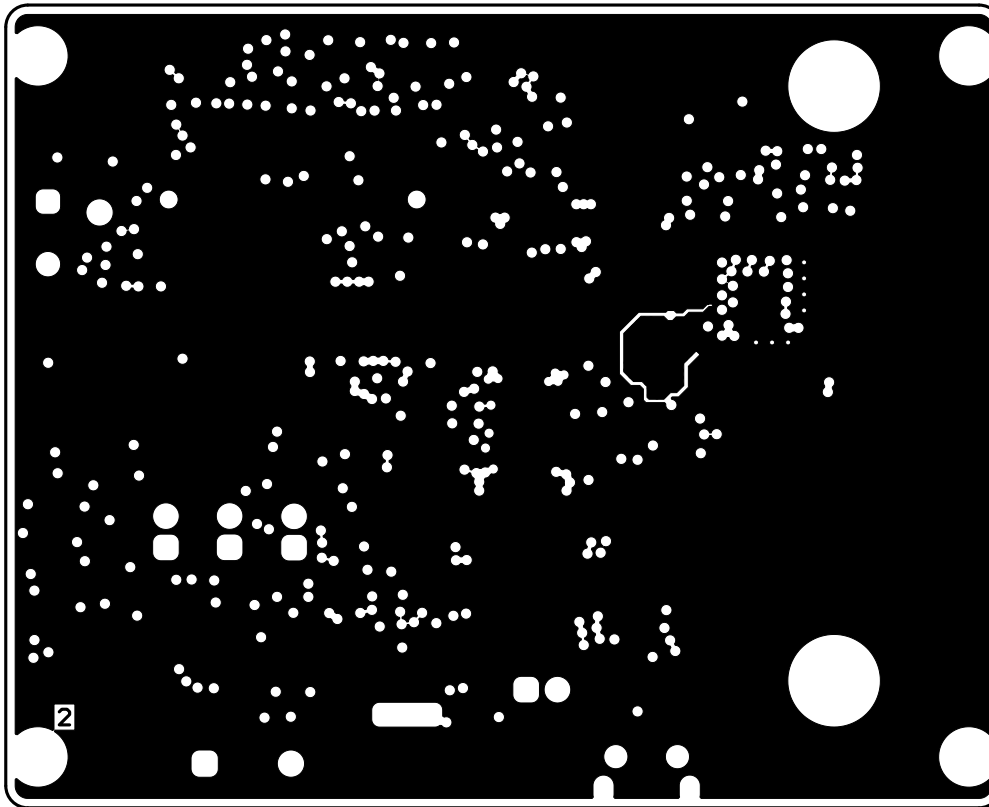
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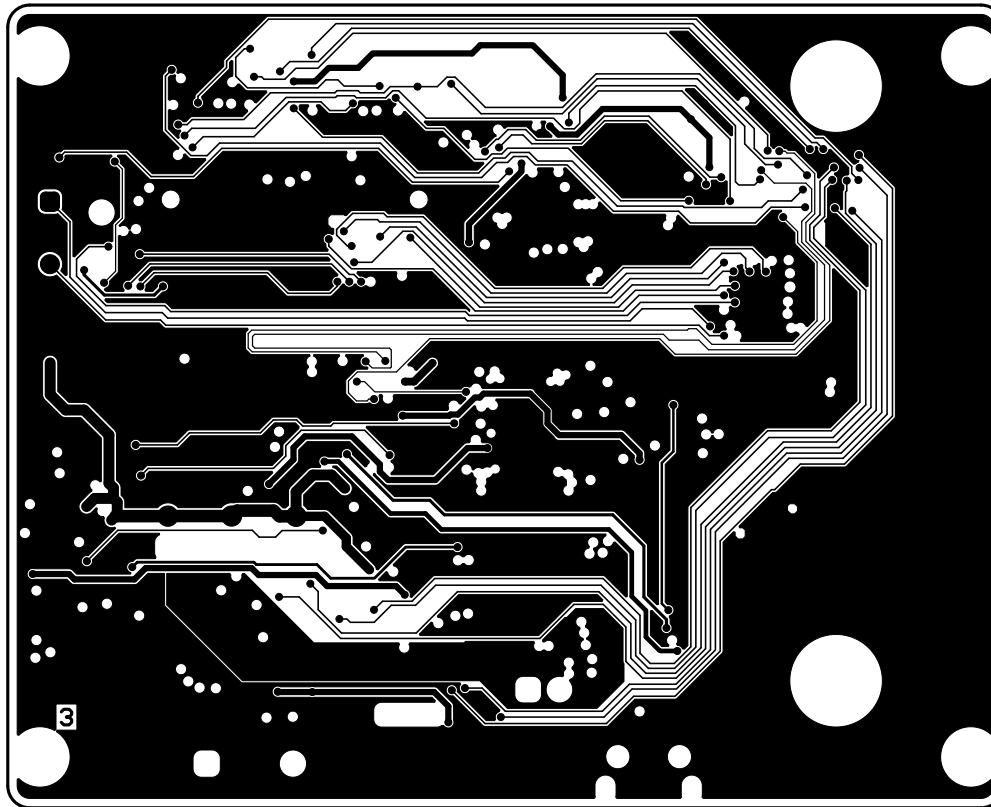
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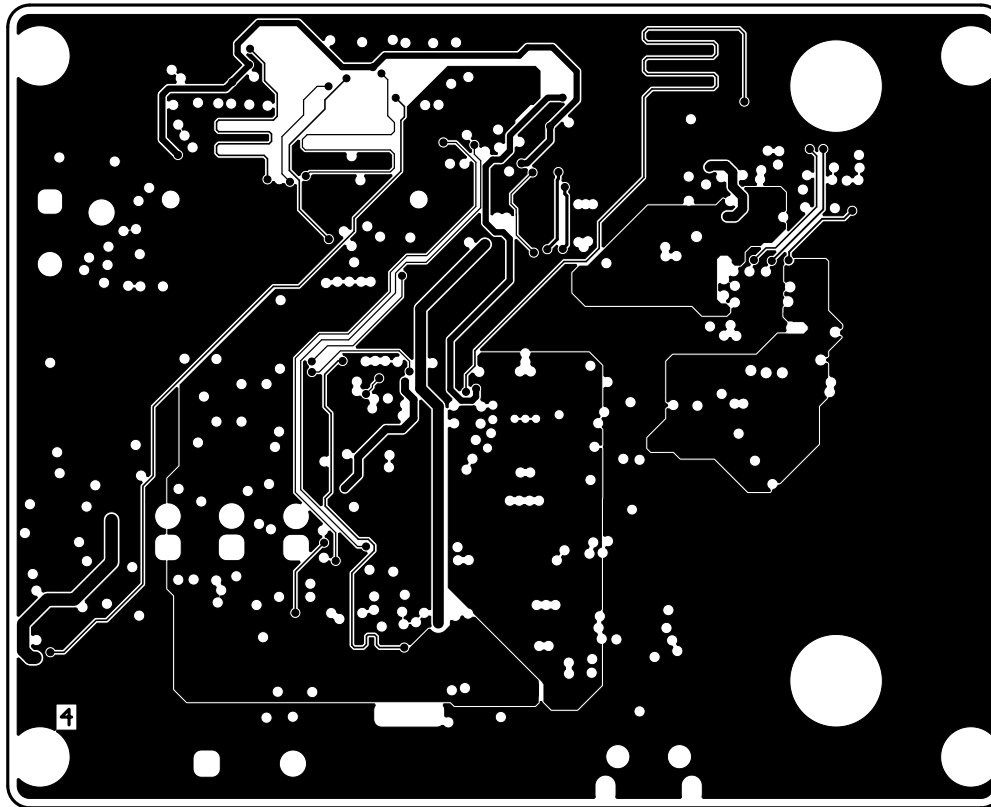
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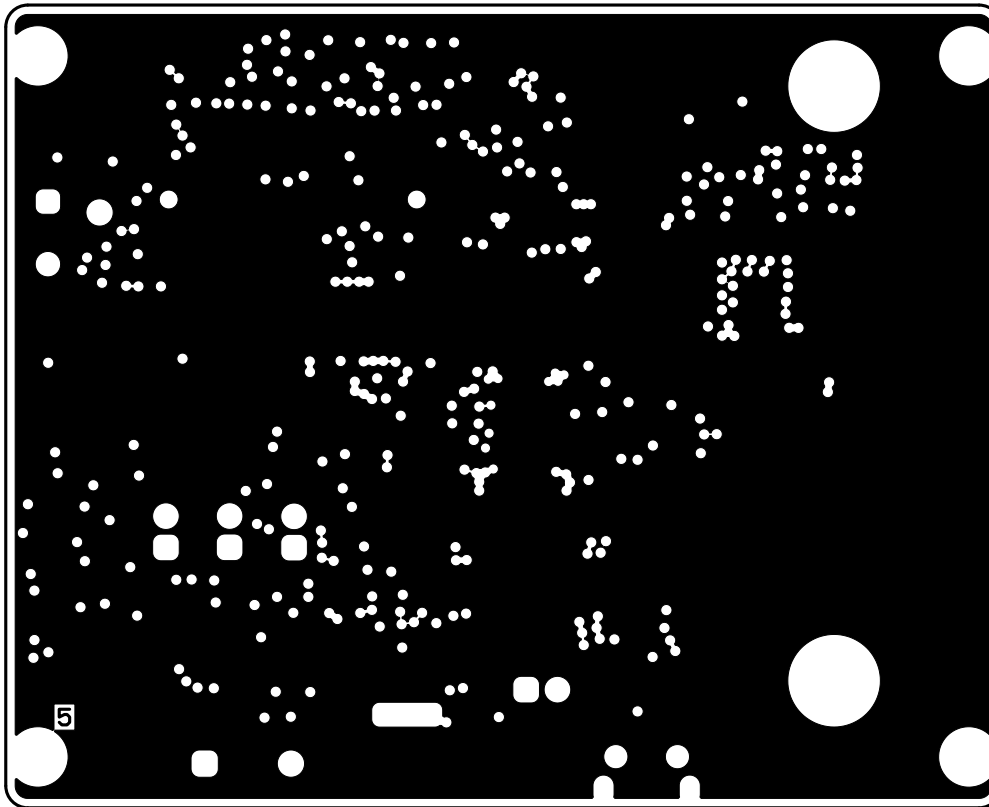
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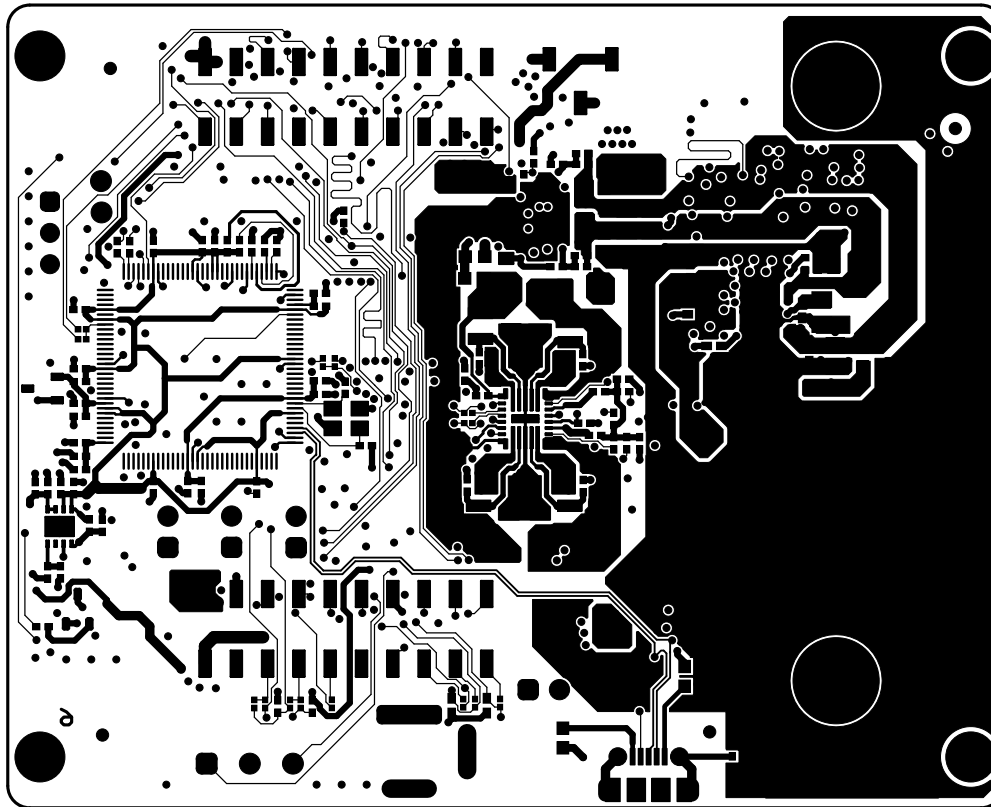
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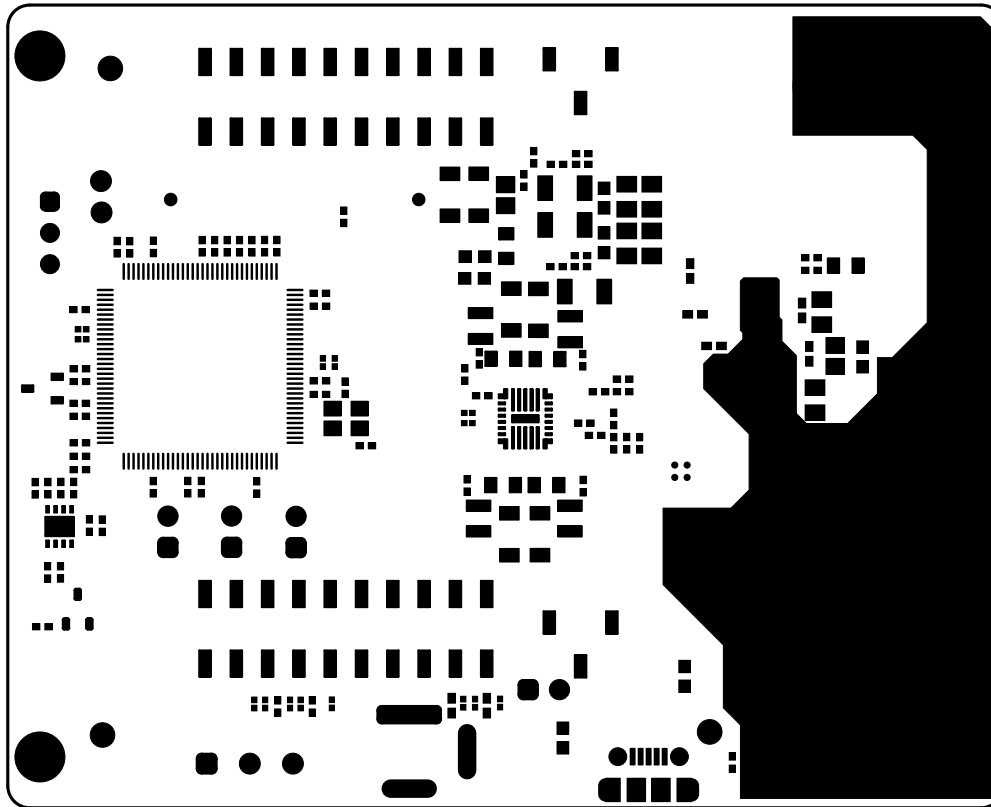
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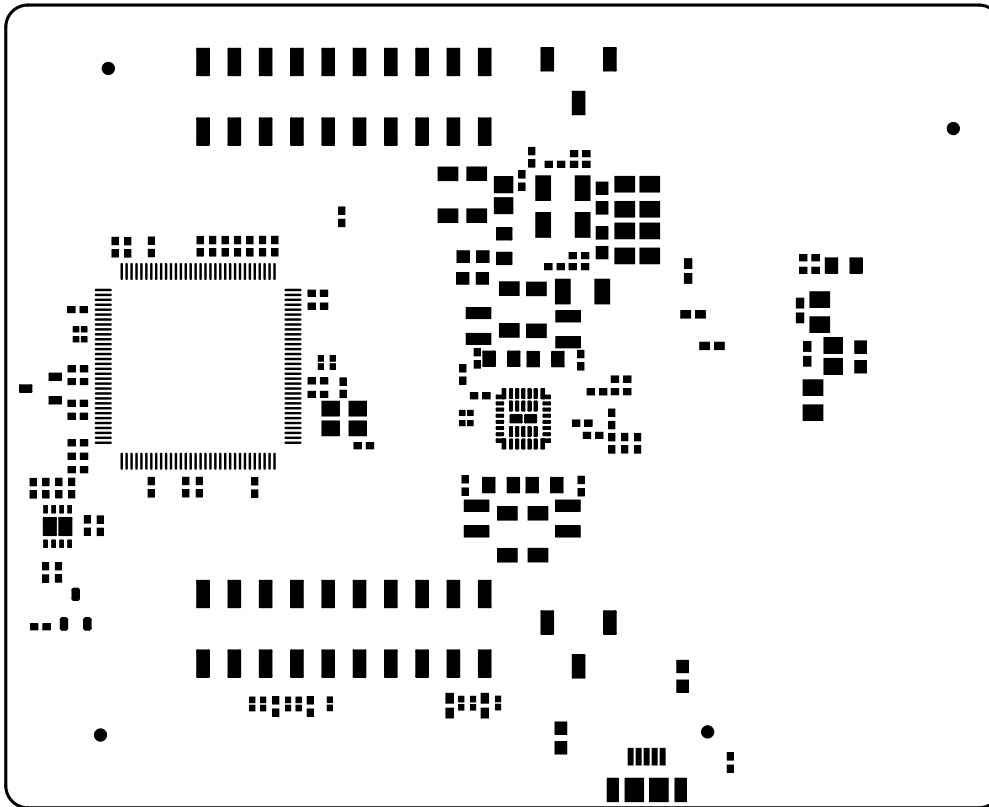
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LAYER NAME = BOTTOM	TID #: N/A		
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