

GND_C

GND_A

Top Layer (Scale 3:2)

Top Layer (Scale 3:2)

GND_B

A

B

C

D

E

F

G

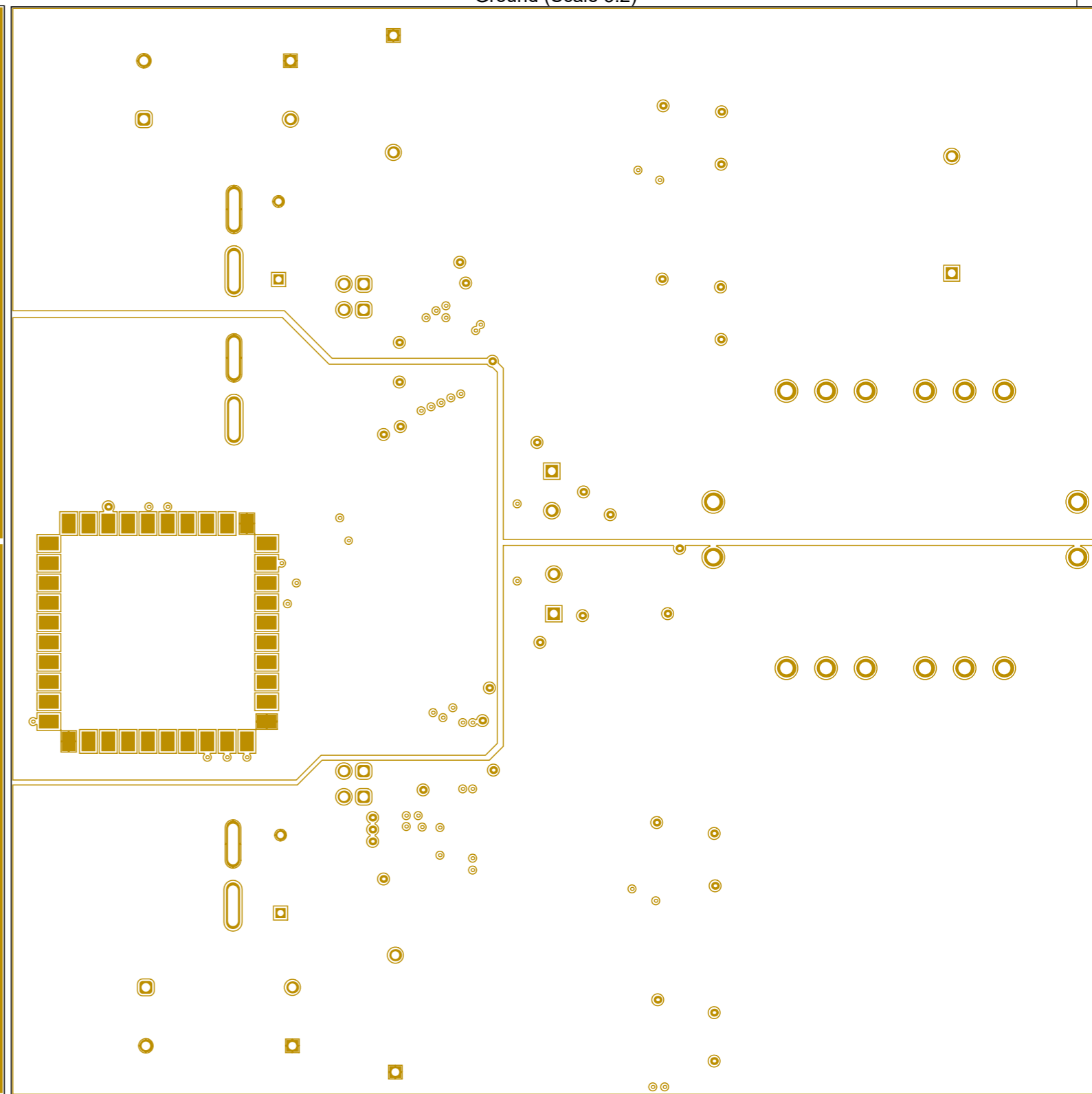
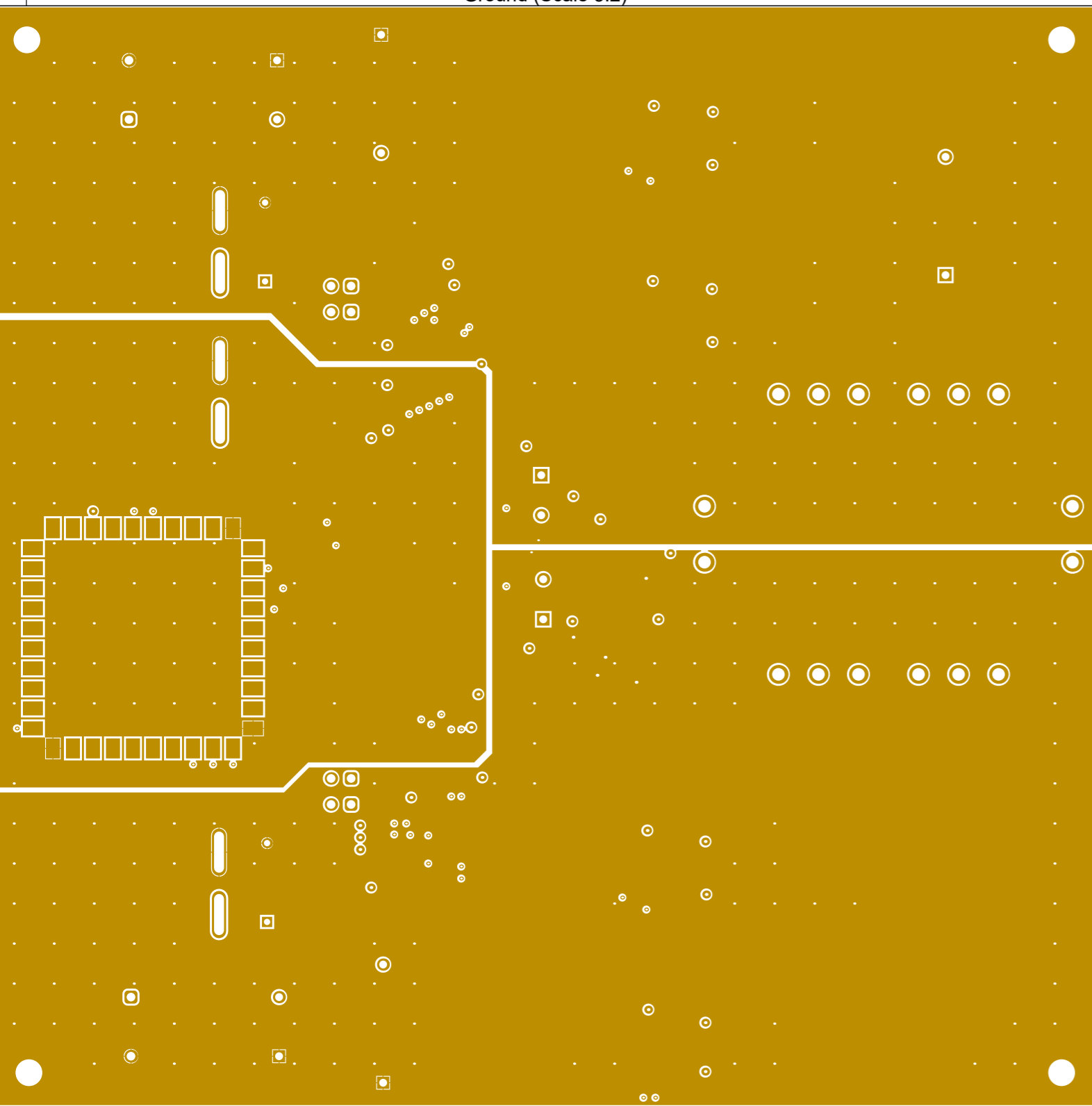
H

1

1

Ground (Scale 3:2)

Ground (Scale 3:2)



6

6

A

B

C

D

E

F

G

H

A

B

C

D

E

F

G

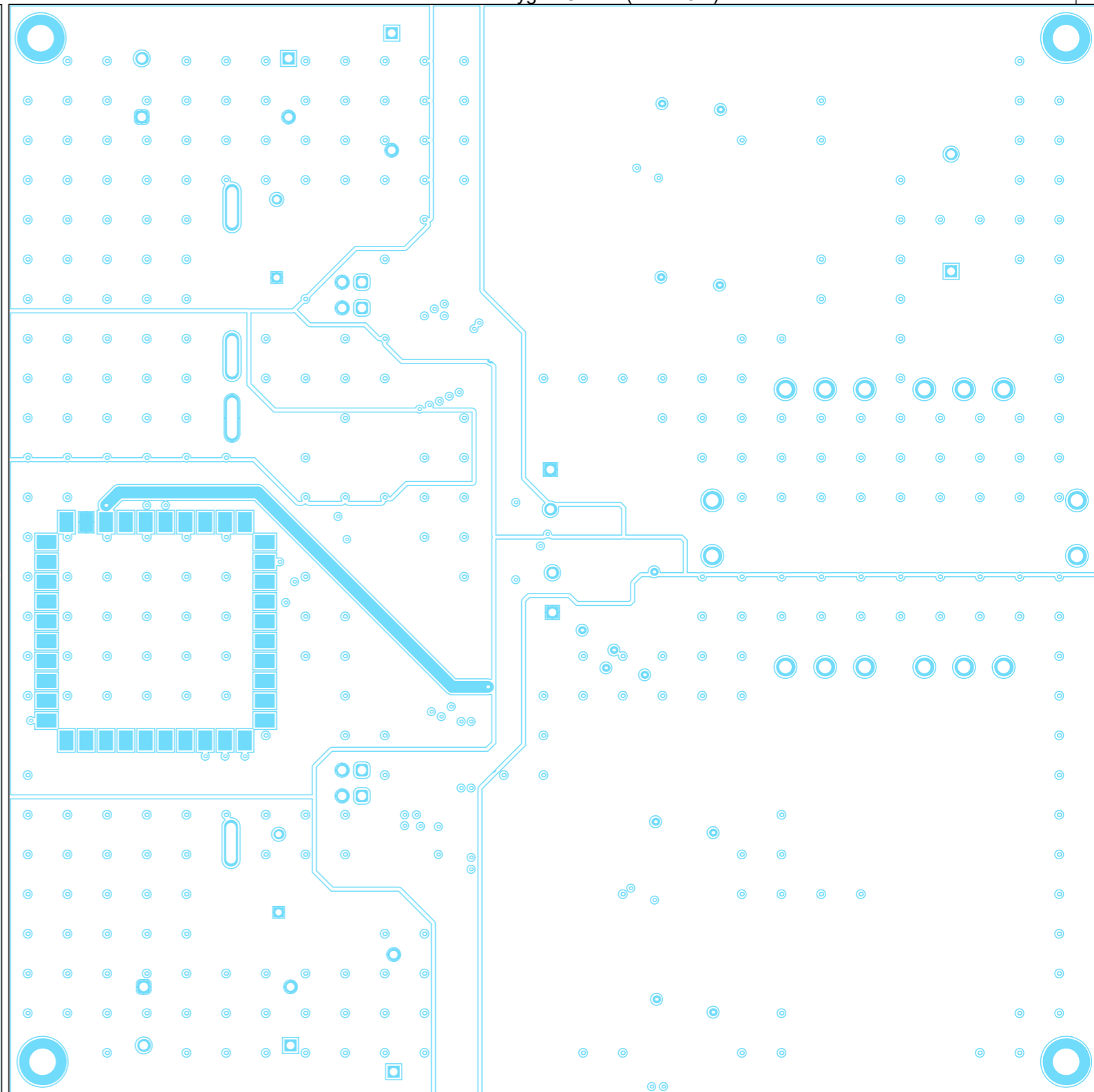
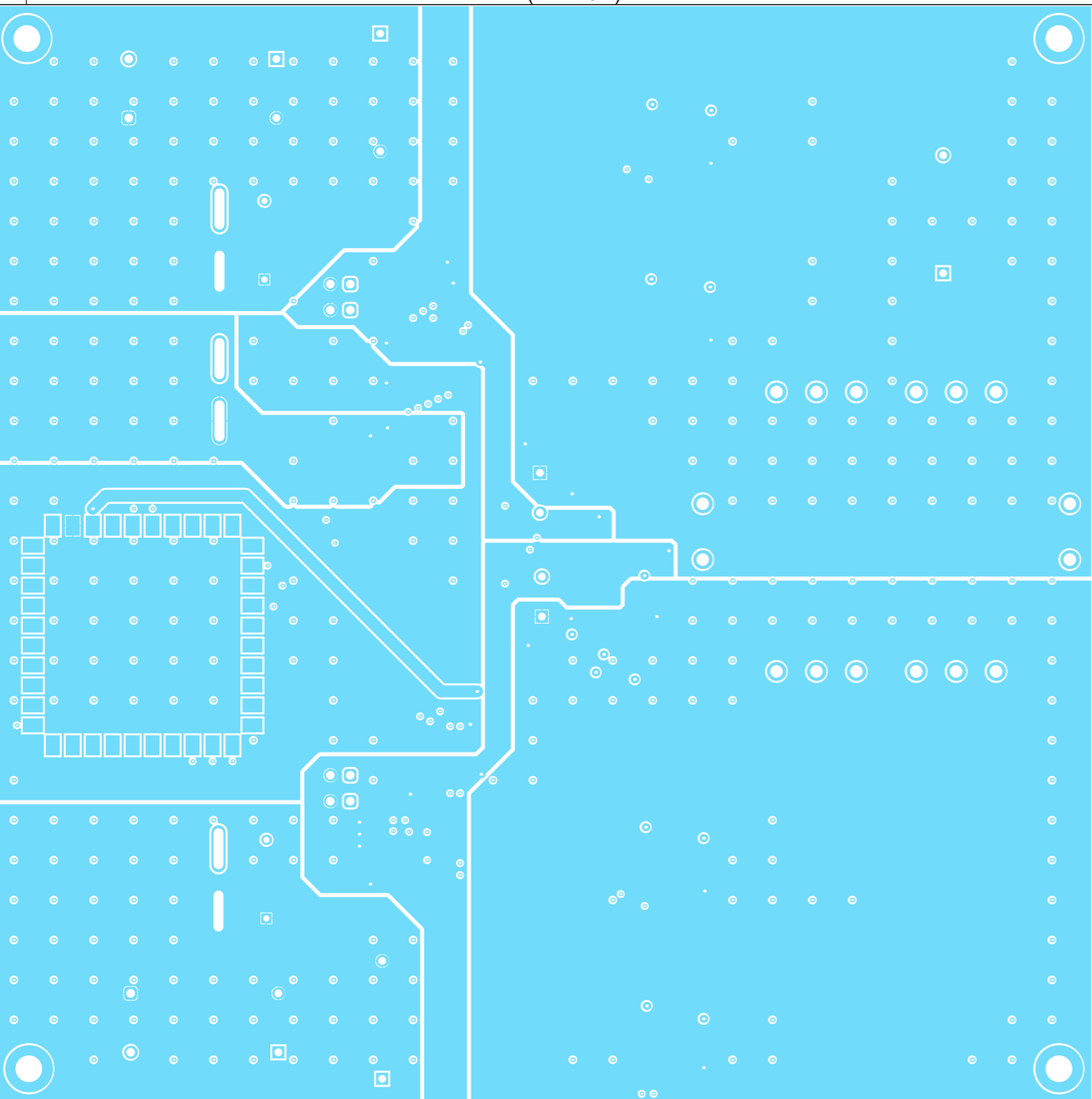
H

1

1

Power (Scale 3:2)

Power with Polygon Cutout (Scale 3:2)



6

6

A

B

C

D

E

F

G

H

A

B

C

D

E

F

G

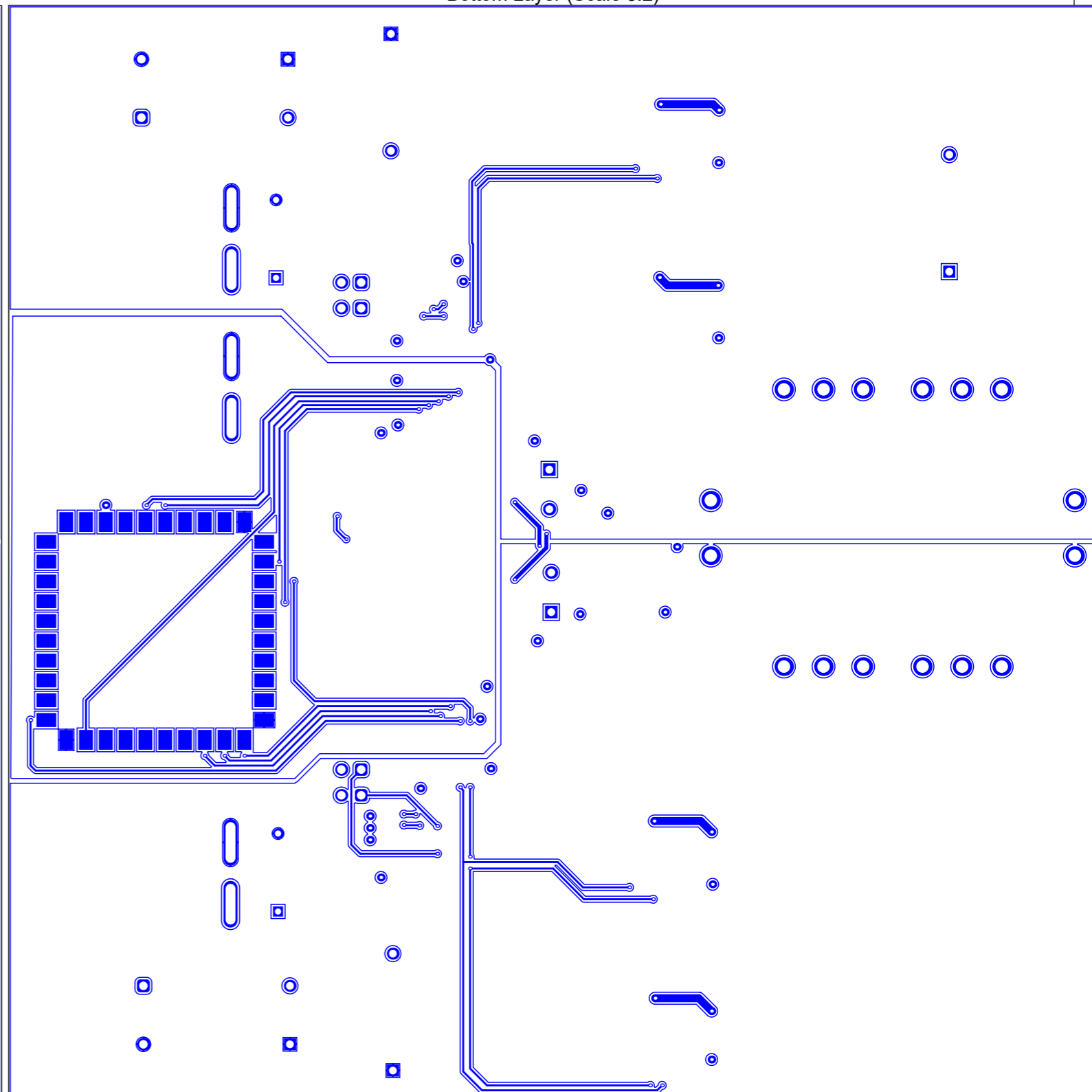
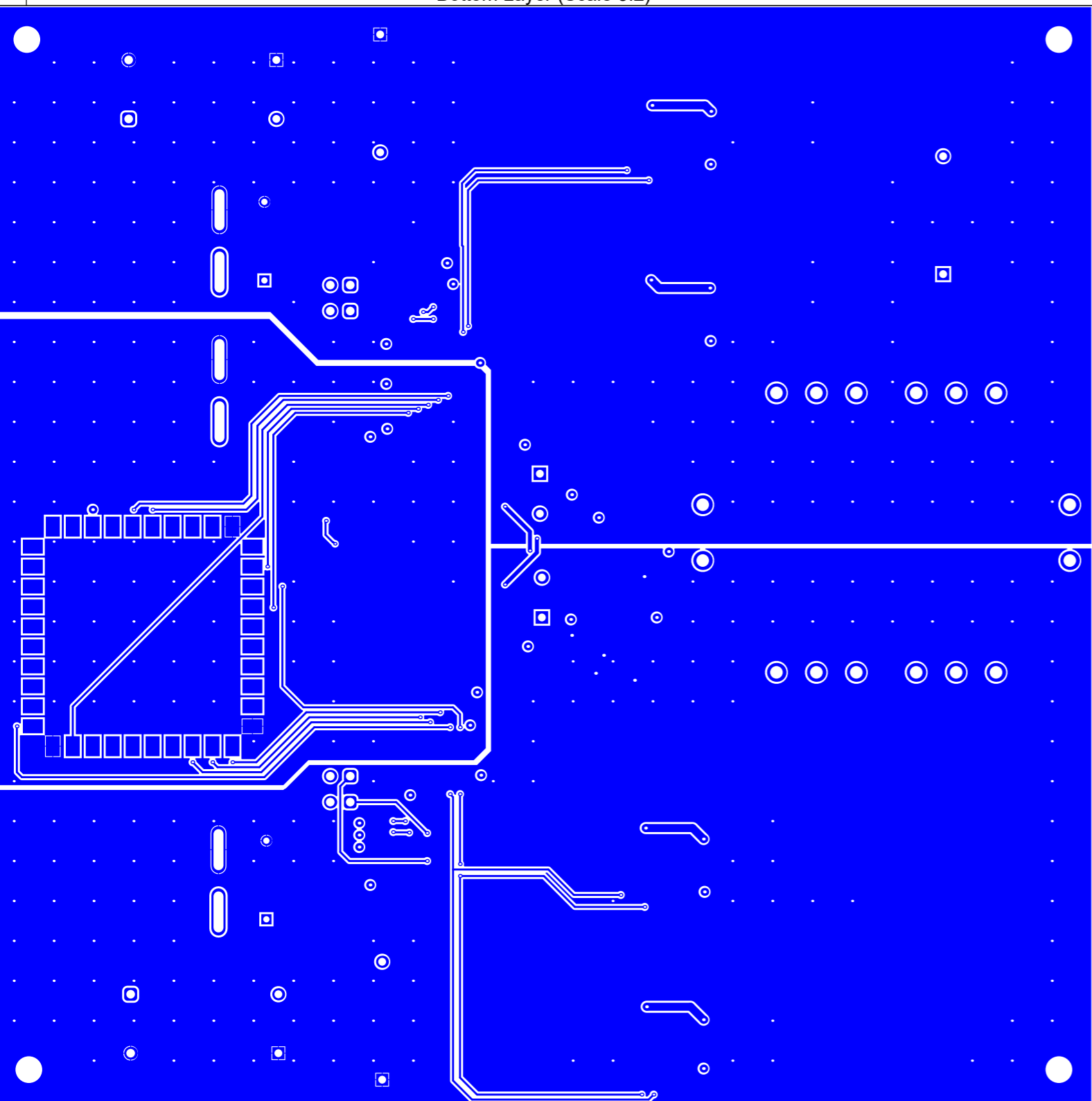
H

1

1

Bottom Layer (Scale 3:2)

Bottom Layer (Scale 3:2)



6

6

A

B

C

D

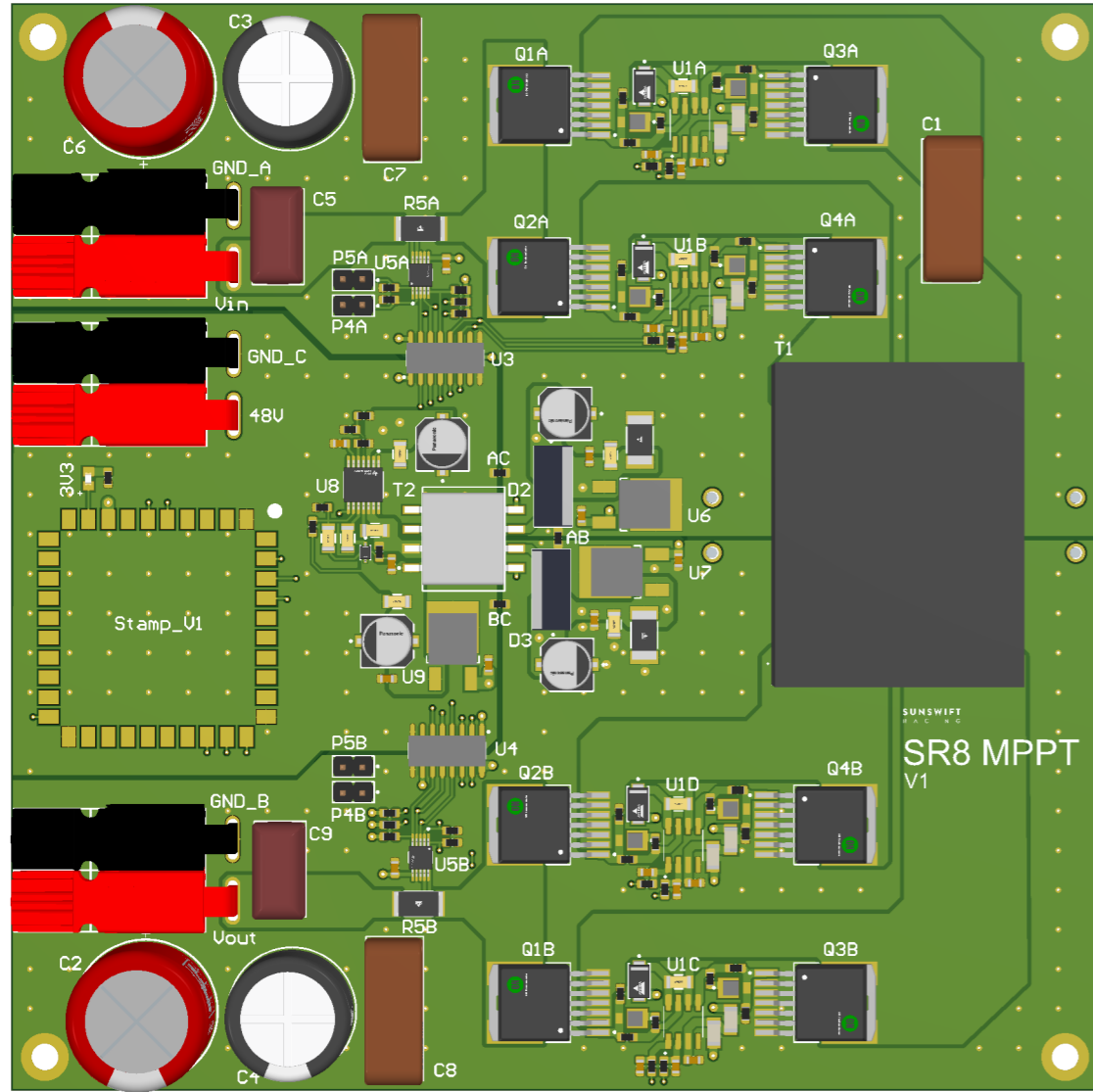
E

F

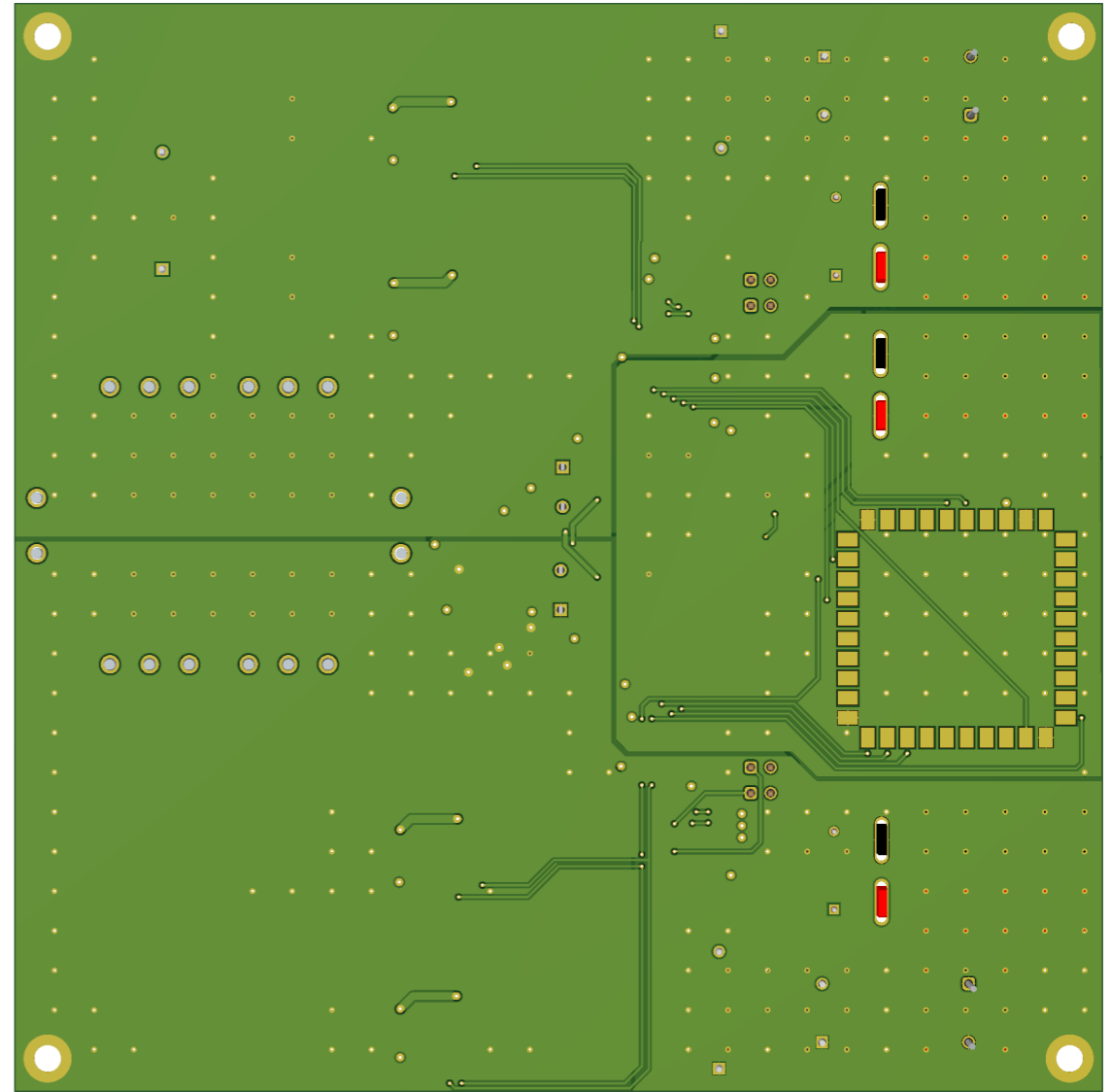
G

H

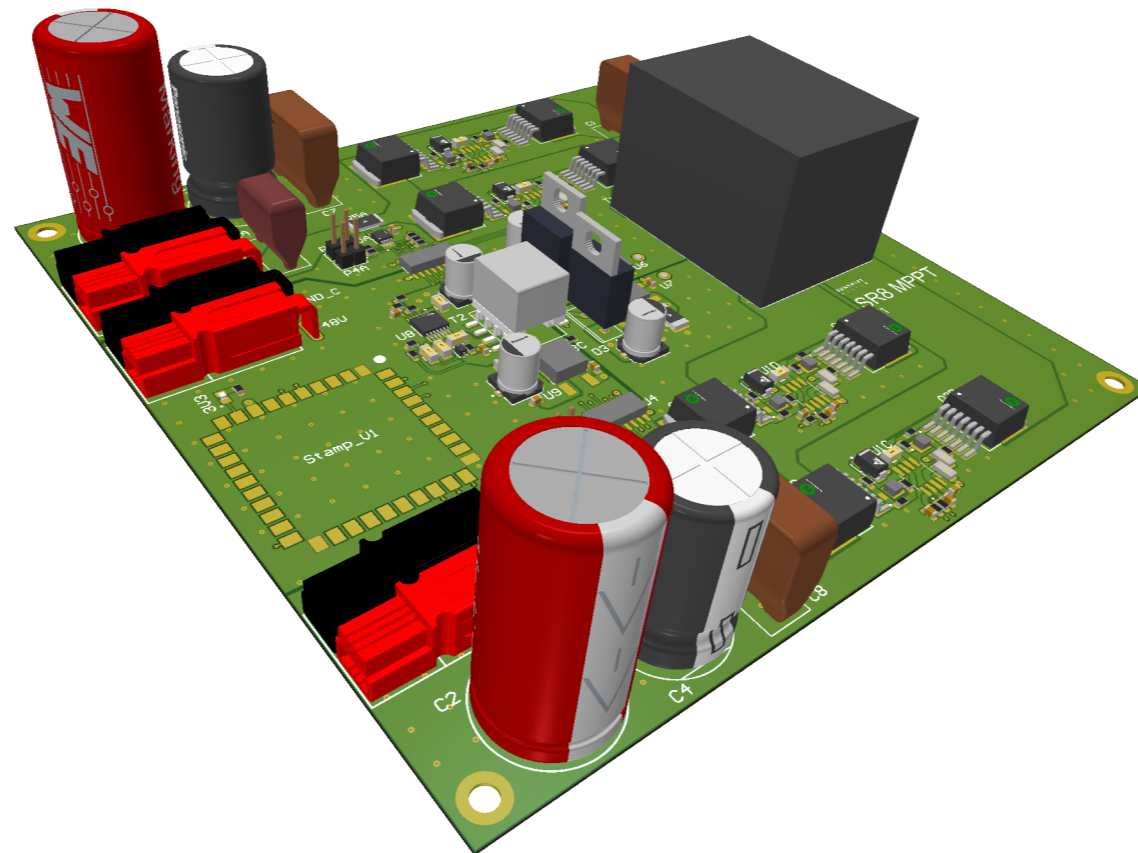
3D Realistic View Top



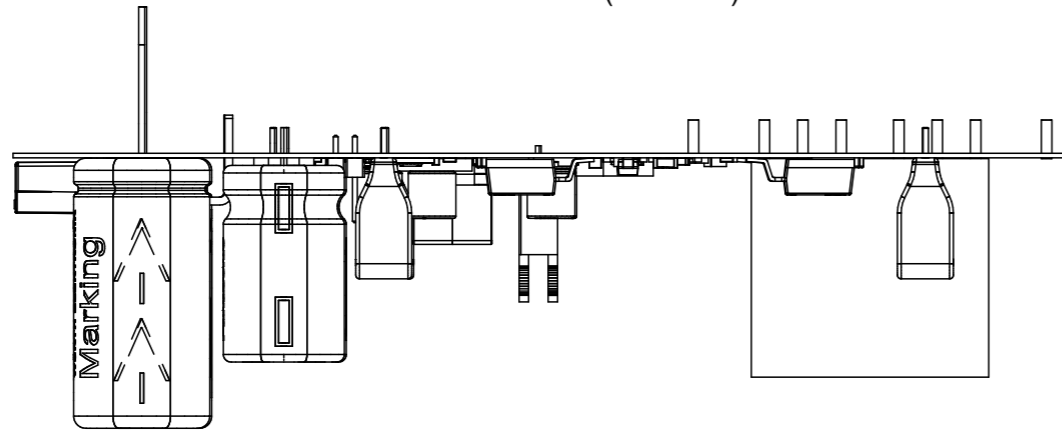
3D Realistic View Bottom



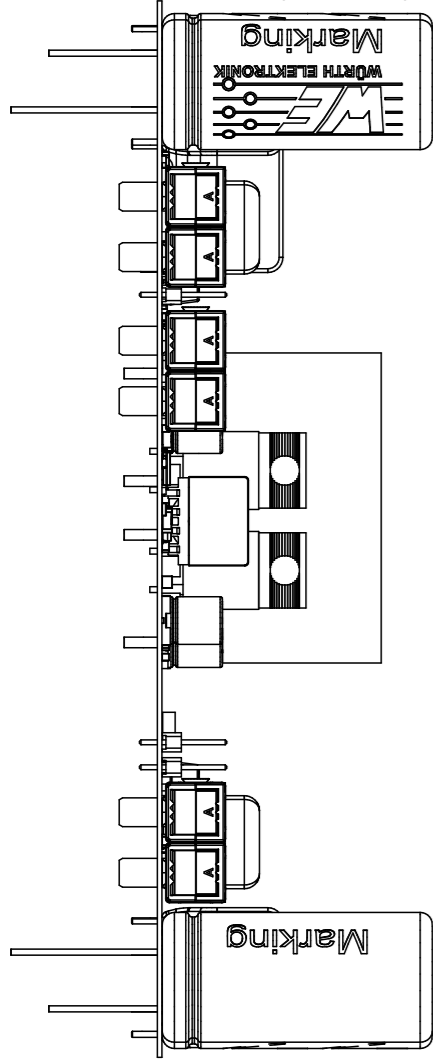
3D Realistic View Isometric



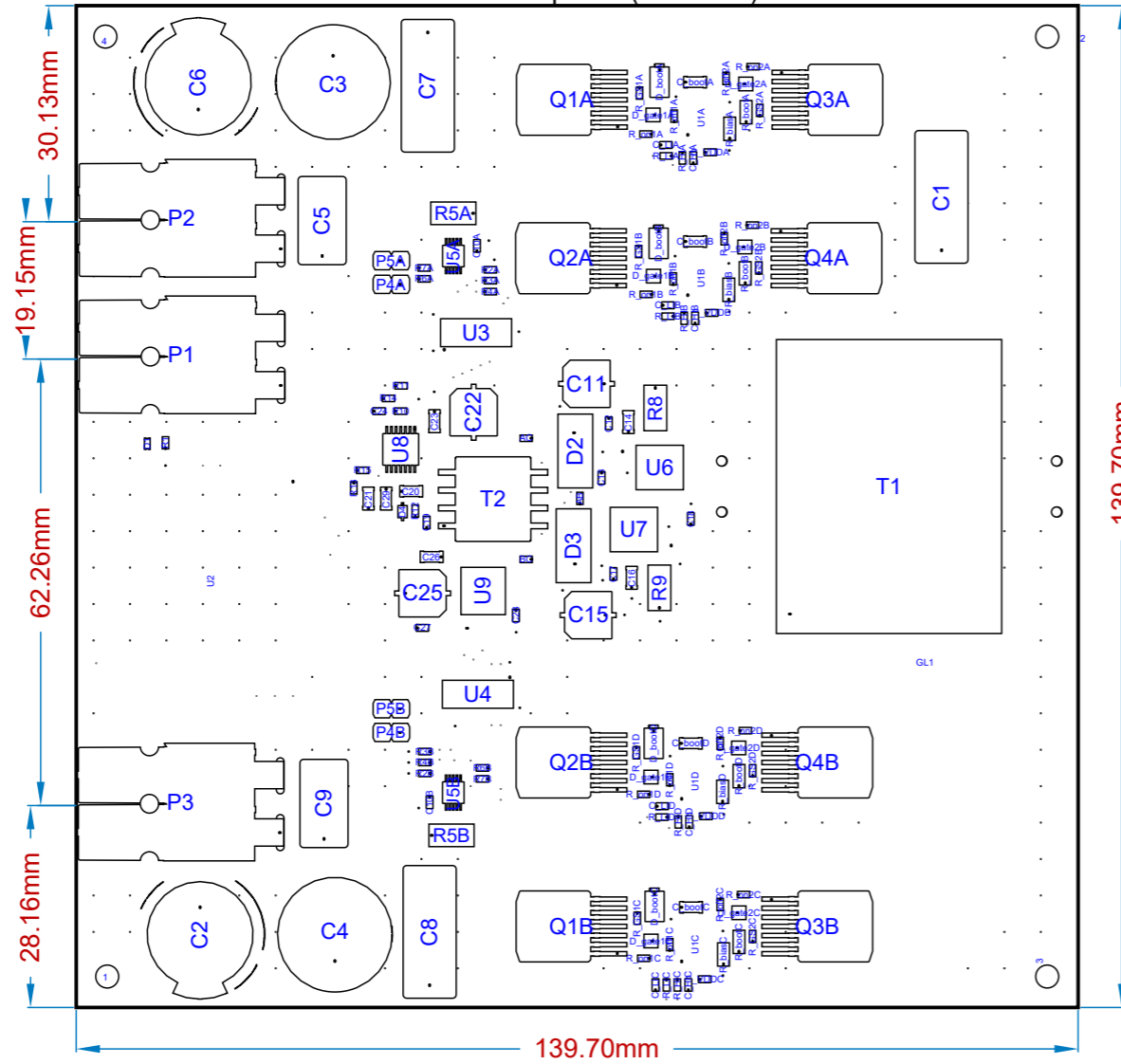
View from Back side (Scale 1:1)



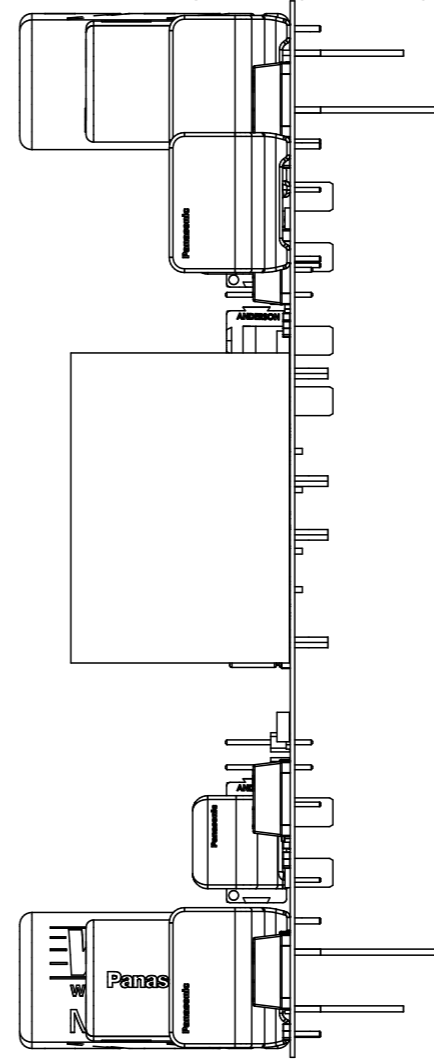
View from Left side (Scale 1:1)



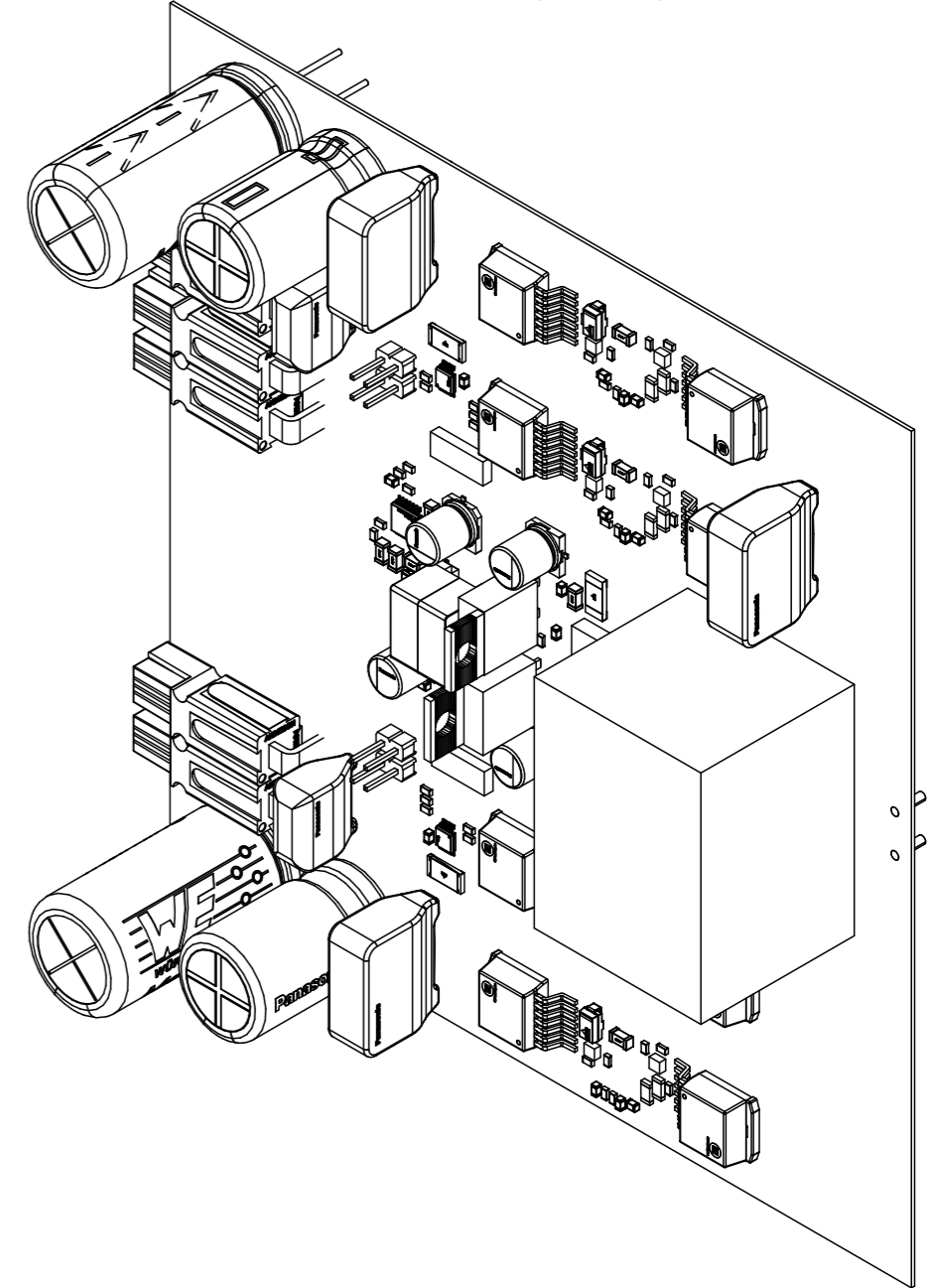
View from Top side (Scale 1:1)



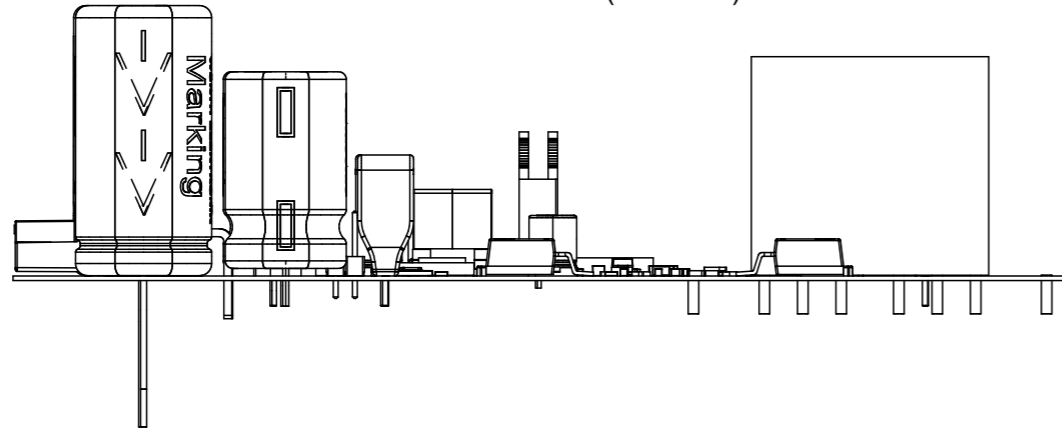
View from Right side (Scale 1:1)



View from Top side (Scale 1:1)



View from Front side (Scale 1:1)

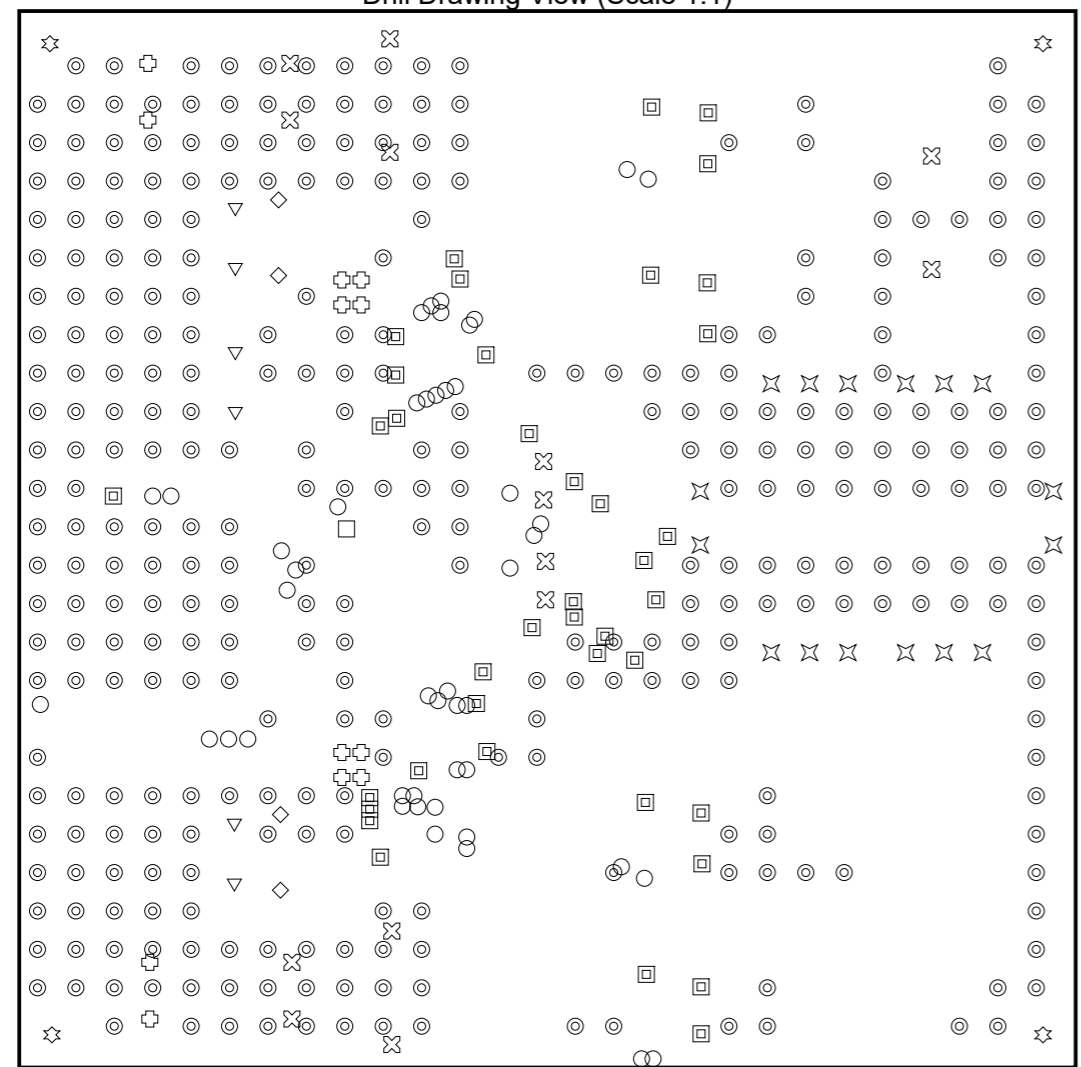


Layer Stack Legend

Material	Layer	Thickness	Dielectric Material	Type	Gerber
	Top Overlay			Legend	GTO
	Surface Material	0.01mm	Solder Resist	Solder Mask	GTS
	Top Layer	0.04mm		Signal	GTL
	Prepreg	0.07mm	PP-006	Dielectric	
	Ground	0.04mm		Signal	G1
		0.32mm	FR-4	Dielectric	
	Power	0.04mm		Signal	G2
	Prepreg	0.07mm	PP-006	Dielectric	
	Bottom Layer	0.04mm		Signal	GBL
	Surface Material	0.01mm	Solder Resist	Solder Mask	GBS
	Bottom Overlay			Legend	GBO

Total thickness: 0.62mm

Drill Drawing View (Scale 1:1)



Bill Of Materials

Line #	Designator	Comment	Quantity	Mouser #	JLPCB Part #
1	1, 2, 3, 4	MH	4		
2	AB, AC, BC, R1, R2A, R2B, R3A, R3B, R4A, R4B, R6A, R6B, R7A, R7B, R10, R11, R12, R13, R14, R15, R_GS1A, R_GS1B, R_GS1C, R_GS1D, R_GS2A, R_GS2B, R_GS2C, R_GS2D, R_HIA, R_HIB, R_HIC, R_HID, R_LIA, R_LIB, R_LIC, R_LID, R_off1A, R_off1B, R_off1C, R_off1D, R_off2A, R_off2B, R_off2C, R_off2D, R_on1A, R_on1B, R_on1C, R_on1D, R_on2A, R_on2B, R_on2C, R_on2D	0, 0603, 330, 0603, 10k, 220k, 0603, 100k, 0603, 10k, 0603, 3k, 0603, 2k, 0603, 100k, 51, 3.3, 2.2	52		[NoValue], C23138, C25804, C22961, C25803, C4211, C22975, C23197, C140101, C22939
3	C1, C7, C8	1u, 250V	3	667-ECQ-E2105JF	
4	C2, C6	470u, 200V	2	661-EKXJ201ELL47140S	
5	C3, C4	100u, 200V	2	667-EEU-EE2D101	
6	C5, C9	10u, 250V	2	667-ECQ-E2106KFW	
7	C10A, C10B, C12, C13, C17, C18, C19, C24, C27, C28, C_HIA, C_HIB, C_HIC, C_HID, C_LIA, C_LIB, C_LIC, C_LID, C_VDDA, C_Vddb, C_VDDC, C_VDDD	100n, 330n, 0603, 100n, 0603, 1n, 0603, 22n, 0603, 33p, 10u	22		C14663, C76621, C1588, C21122, C1663, C96446
8	C11, C15, C22, C25	22u, 63V	4	667-EEE-FK1J220XL	
9	C14, C16, C20, C21, C23, C26, C29, C_bootA, C_bootB, C_bootC, C_bootD	1u, 1206, 10n, 1206, 100n, 1206	11		C1848, C1846, C24497
10	D1	LED EMERALD 0805	1		C2297
11	D2, D3	MBR10100-M3/4W	2		C260261
12	D4	SD103AWS-7-F	1		C154860
13	D_bootA, D_bootB, D_bootC, D_bootD	BYG20J-E3/TR	4		C241925
14	D_gate1A, D_gate1B, D_gate1C, D_gate1D, D_gate2A, D_gate2B, D_gate2C, D_gate2D	MBRM130LT1G	8		C154834
15	GL1	Sunswift Logo New	1		
16	P1, P2, P3	Anderson PP1545	3		
17	P4A, P4B, P5A, P5B	A0, A1	4		
18	Q1A, Q1B, Q2A, Q2B, Q3A, Q3B, Q4A, Q4B	NTBG060N065SC1	8		C5209021
19	R5A, R5B	15mR, 3W, 2512	2		C2985715
20	R8, R9	100R, 3W, 2521	2	279-3522100RJT	
21	R_biasA, R_biasB, R_biasC, R_biasD, R_bootA, R_bootB, R_bootC, R_bootD	10, 1206, 2.2, 1206	8		C17903, C326574
22	T1	RM14 TDK	1		
23	T2	750310564	1	710-750310564	
24	U1A, U1B, U1C, U1D	UCC27712DR	4		C485818
25	U2	Stamp V1	1		
26	U3, U4	Si8650EC-B-IS1	2	634-SI8650EC-B-IS1	
27	U5A, U5B	INA228AIDGST	2		C2887910
28	U6, U7, U9	L78M05ABDT-TR	3		C58069
29	U8	LM5161QPWPRQ1	1		C468246

Drill Table

Symbol	Count	Hole Size	Plated	Hole Tolerance
□	1	0.20mm	Plated	
○	46	0.25mm	Plated	
⊙	332	0.30mm	Plated	
⊠	40	0.38mm	Plated	
◇	4	0.80mm	Plated	
⊗	14	1.00mm	Plated	
⊕	12	1.10mm	Plated	
▽	6	1.27mm	Plated	
⊗	16	1.60mm	Plated	
☆	4	3.40mm	Plated	
	475 Total			