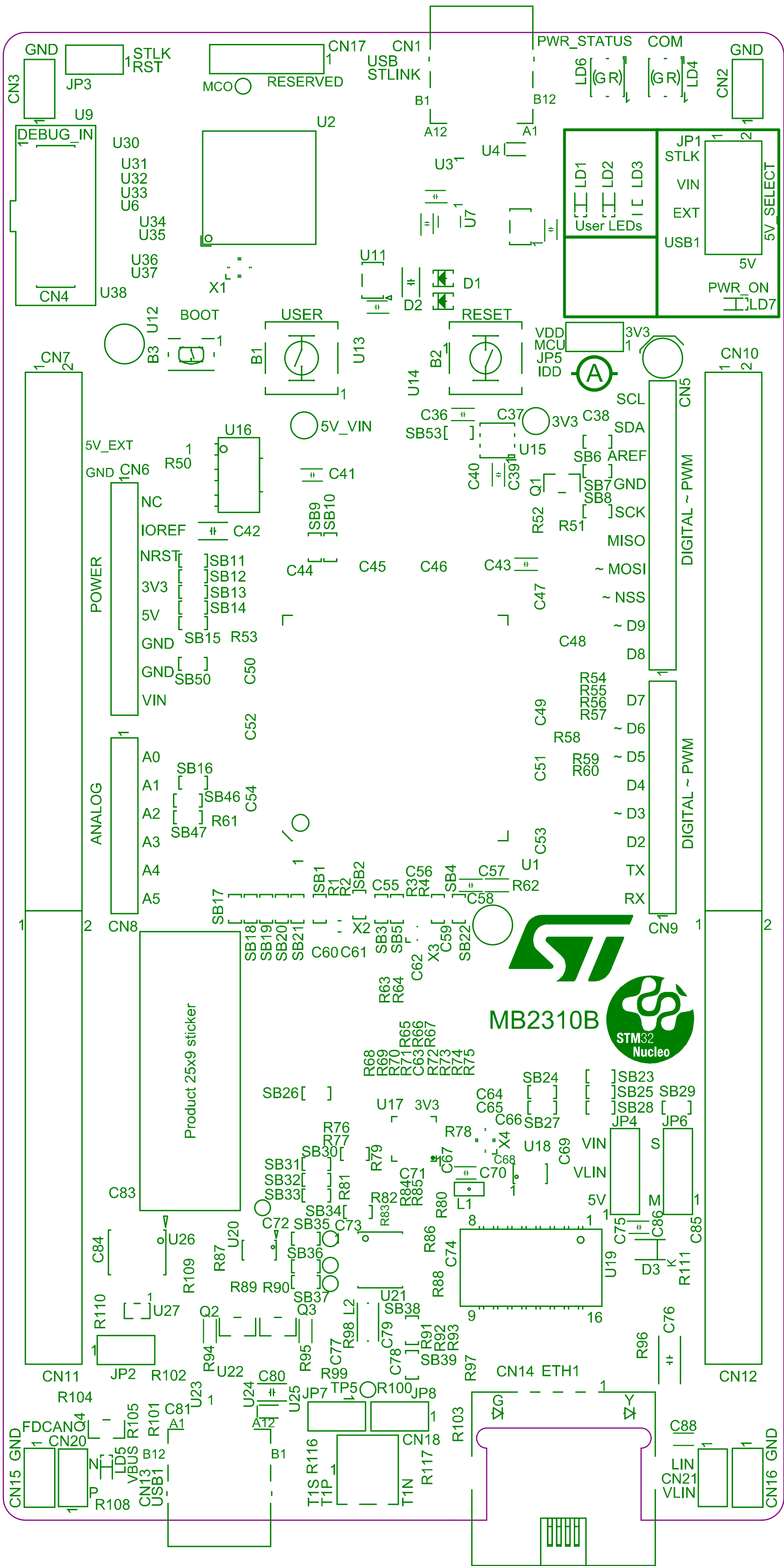
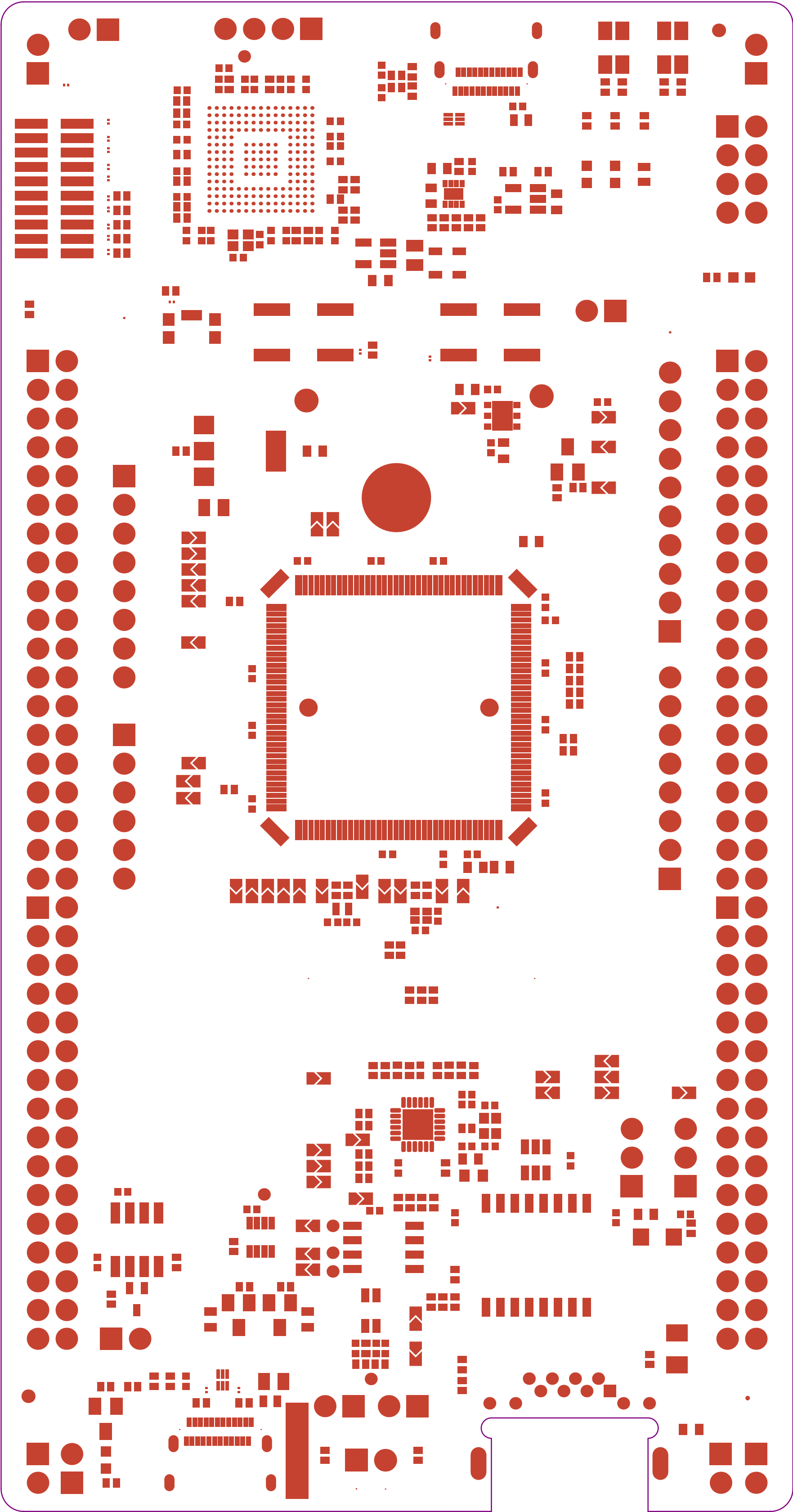
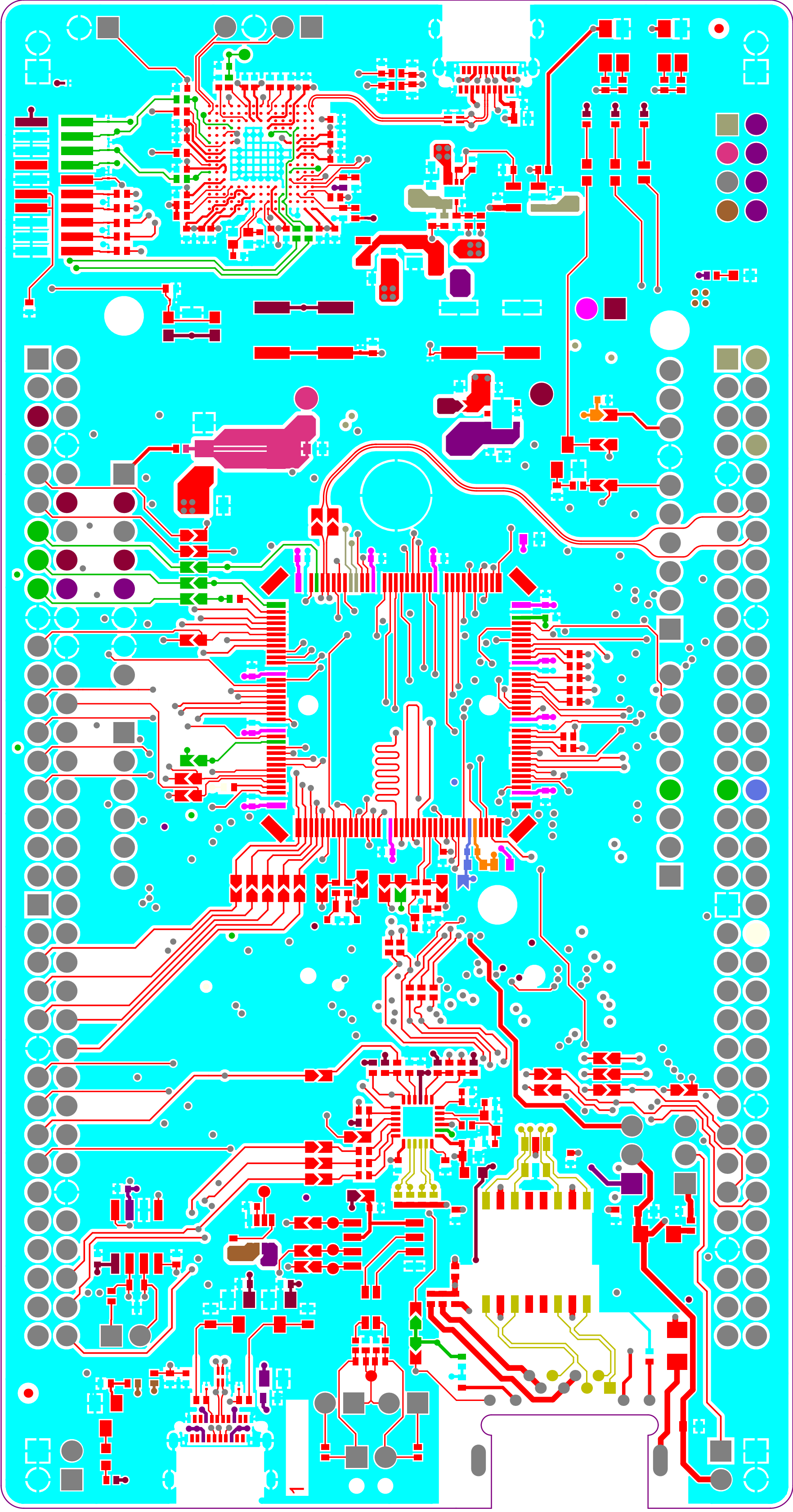




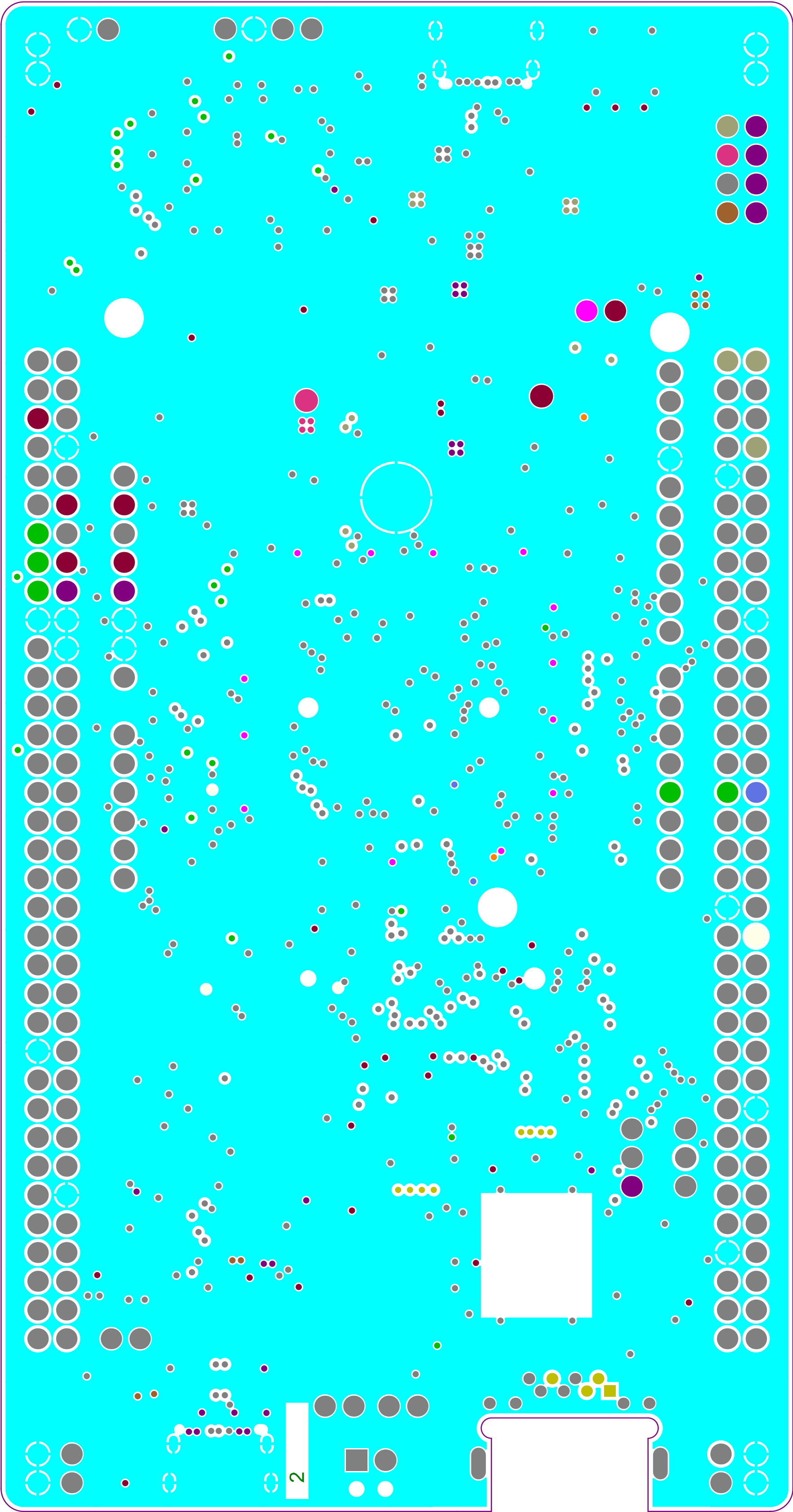
Project: NUCLEO-144 STM32C5A3		
Layer: Top Overlay	Gerber: .GTO	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



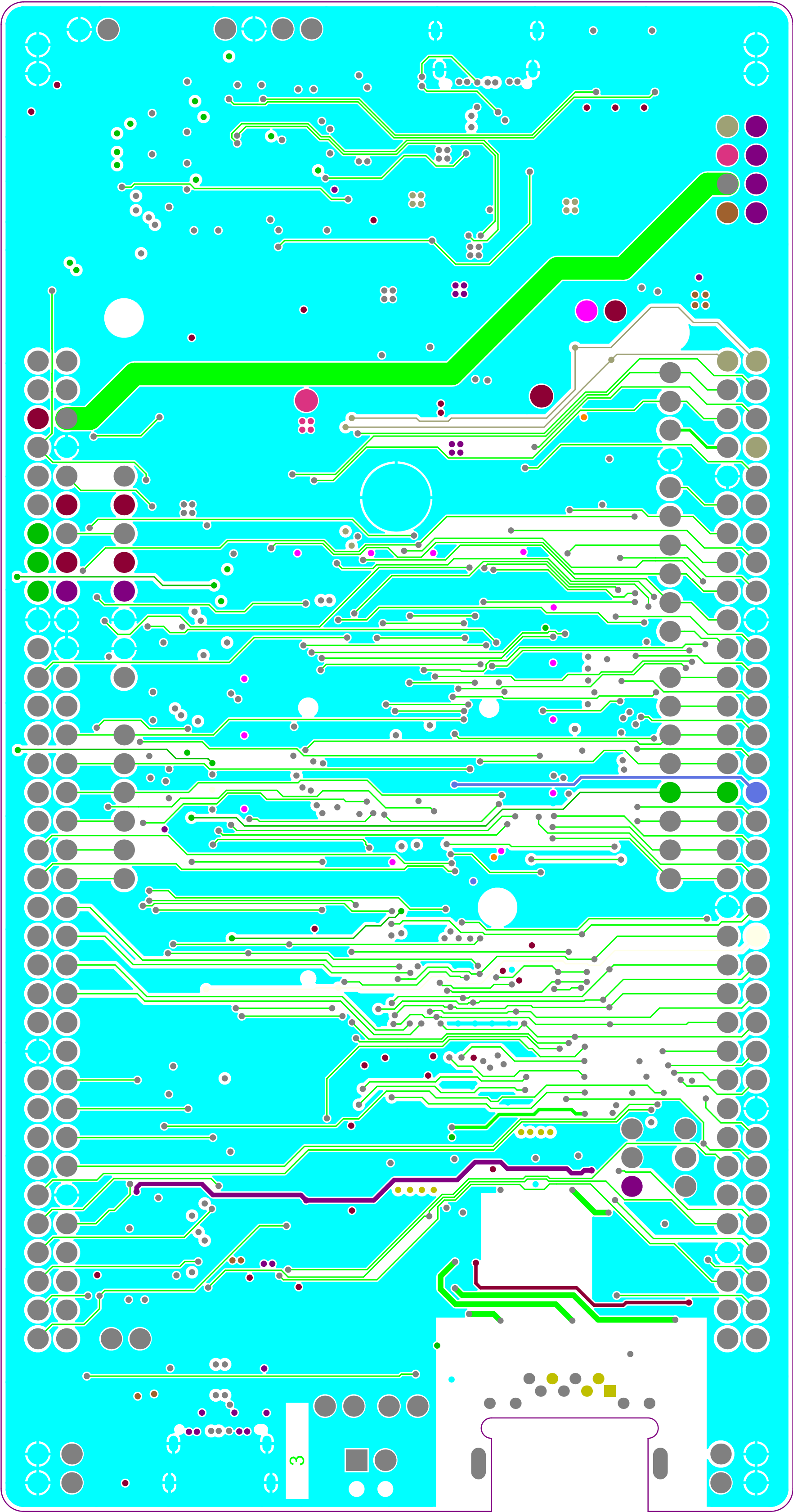
Project: NUCLEO-144 STM32C5A3		
Layer: Top Solder	Gerber: .GTS	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



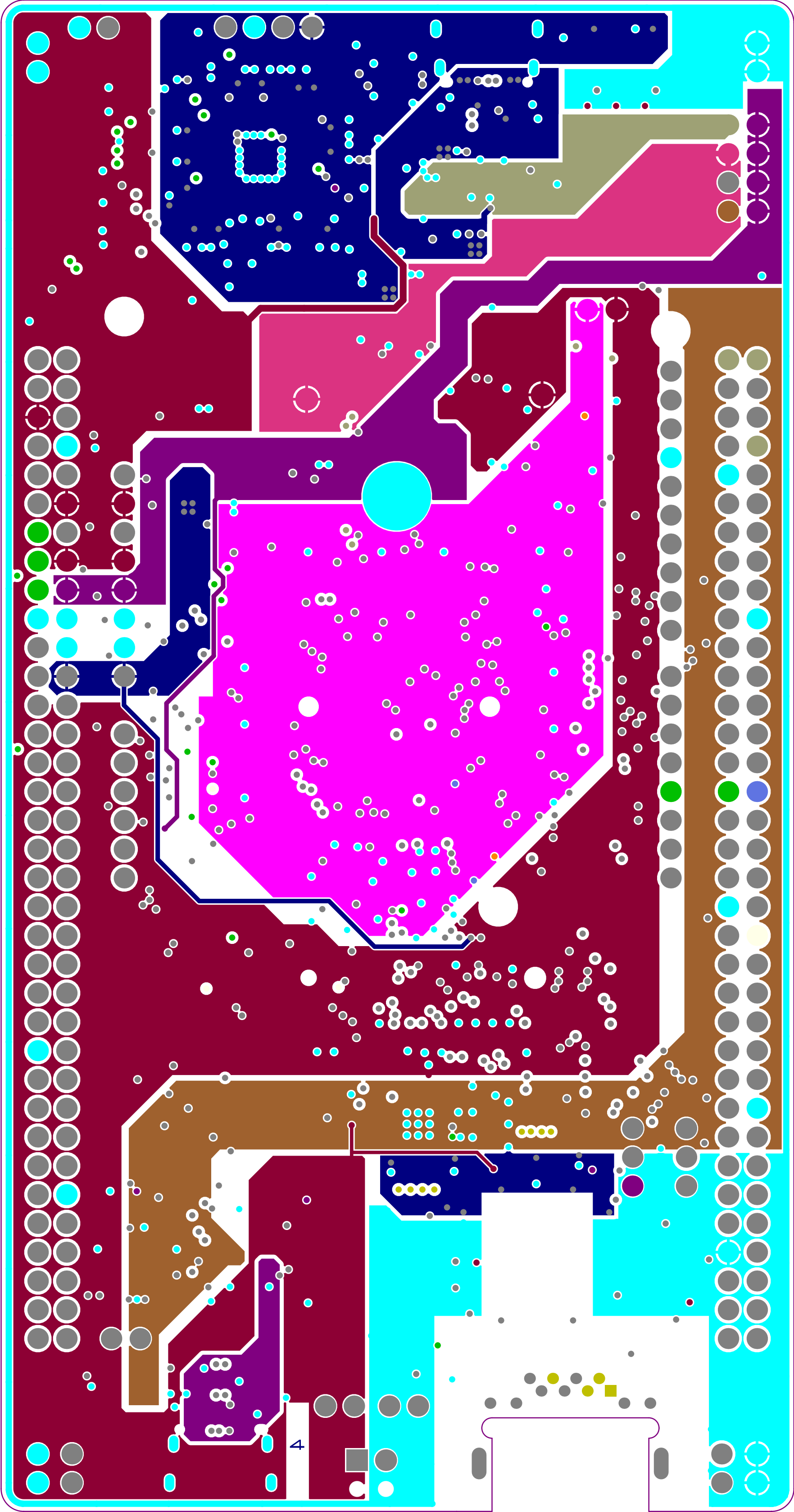
Project: NUCLEO-144 STM32C5A3		
Layer: Top Layer	Gerber: .GTL	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



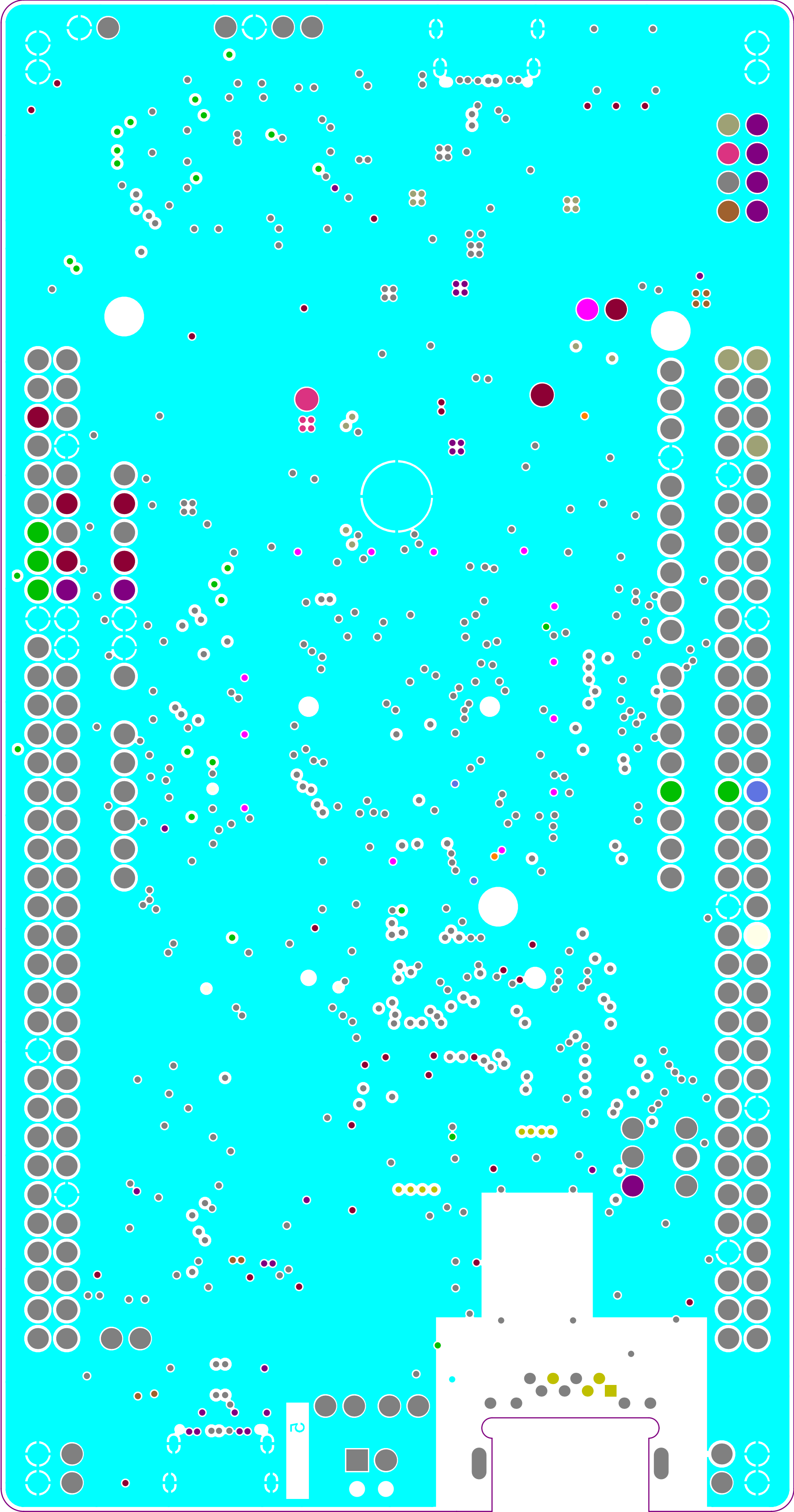
Project: NUCLEO-144 STM32C5A3		
Layer: Signal Layer 1	Gerber: .G1	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



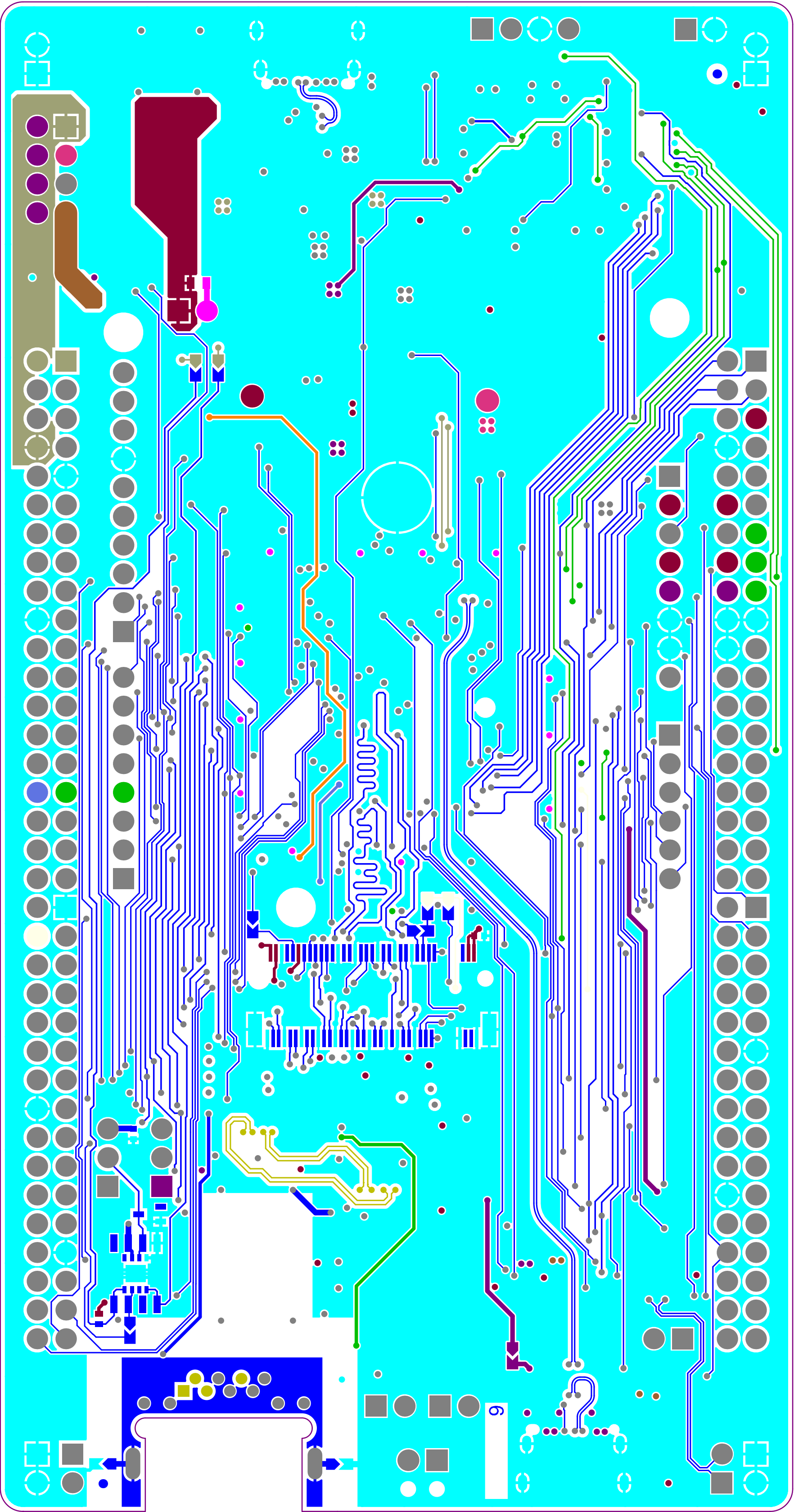
Project: NUCLEO-144 STM32C5A3		
Layer: Signal Layer 2	Gerber: .G2	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



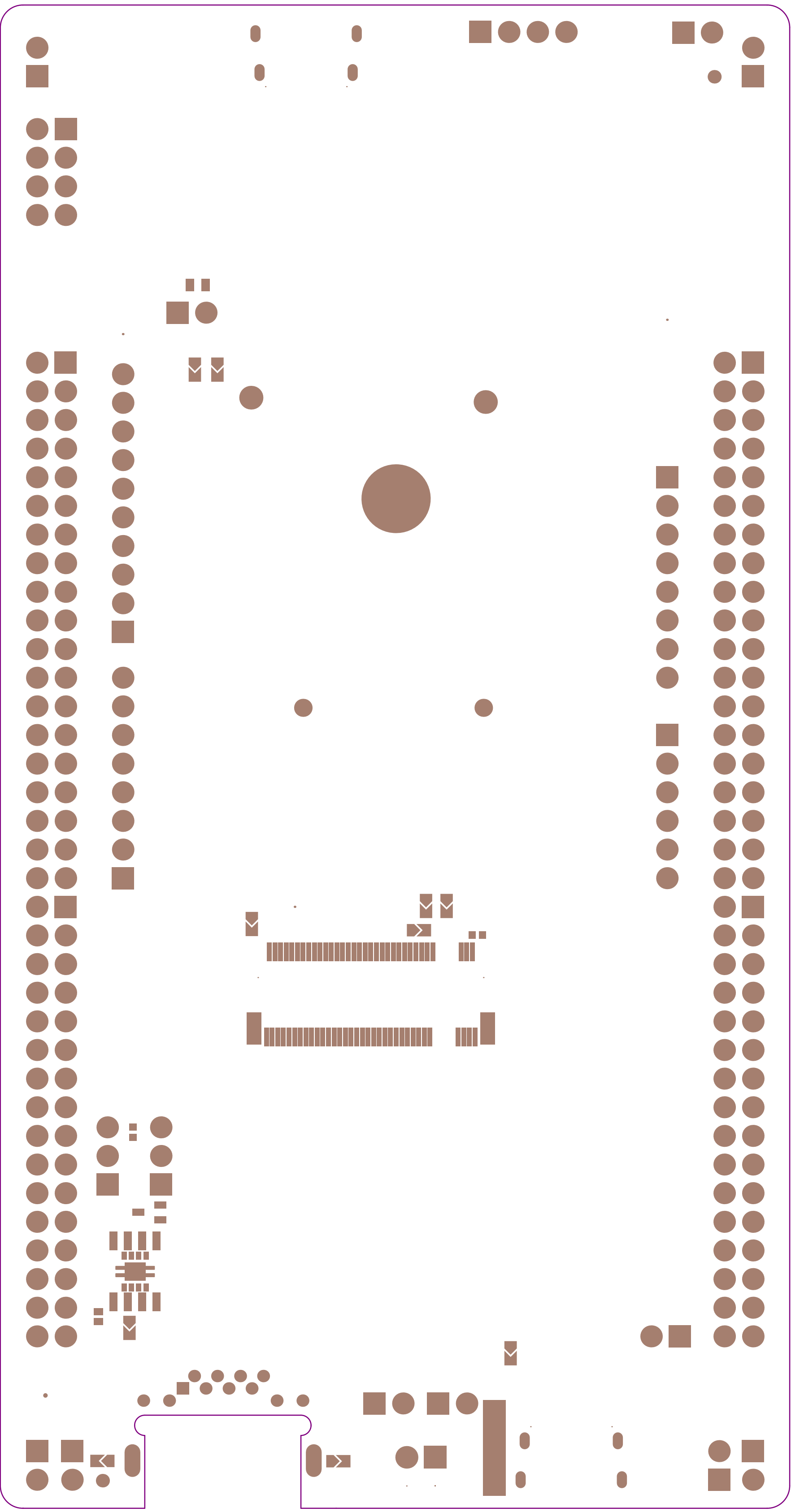
Project: NUCLEO-144 STM32C5A3		
Layer: Signal Layer 3	Gerber: .G3	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



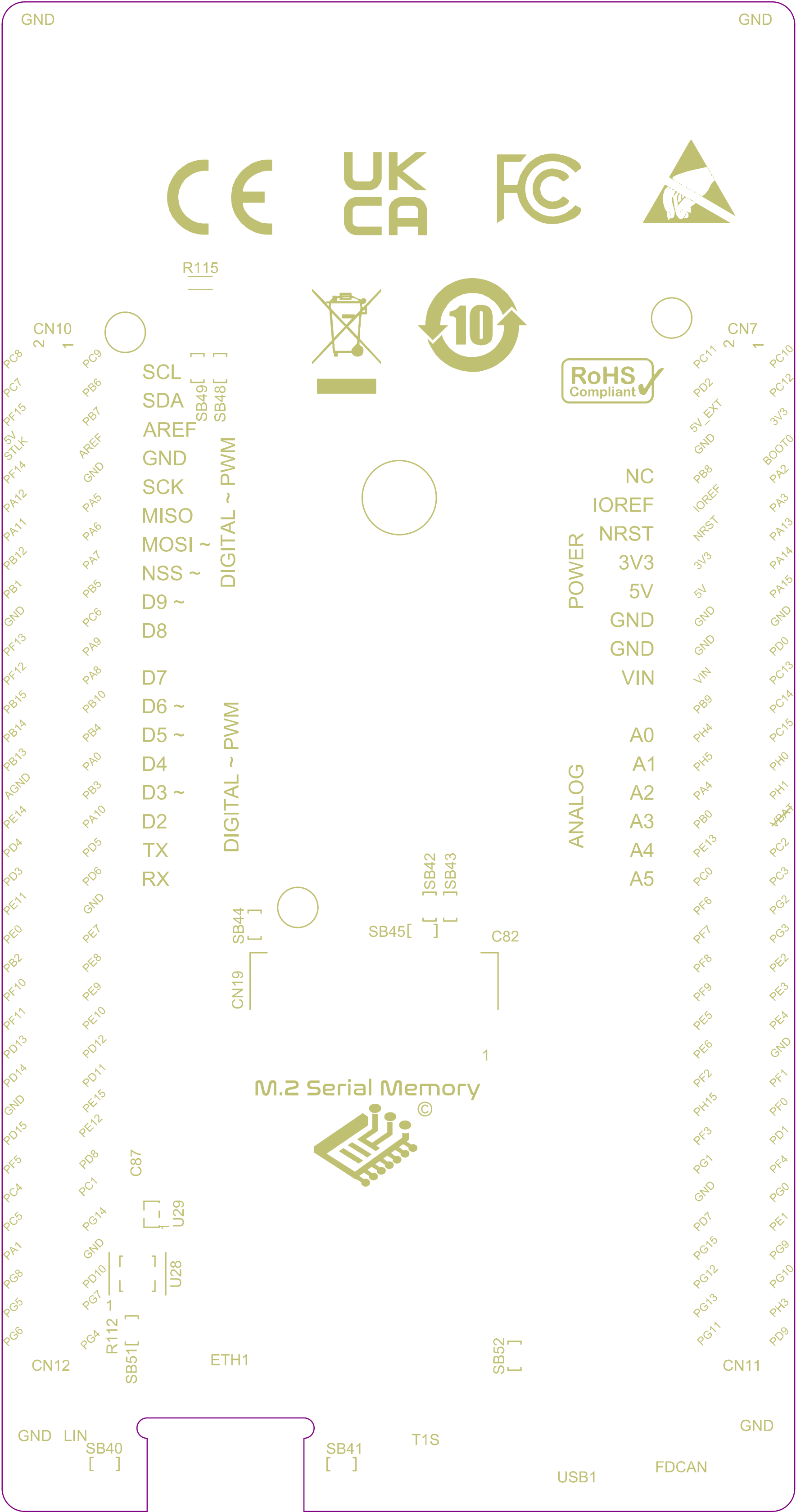
Project: NUCLEO-144 STM32C5A3		
Layer: Signal Layer 4	Gerber: .G4	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



Project: NUCLEO-144 STM32C5A3		
Layer: Bottom Layer	Gerber: .GBL	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



Project: NUCLEO-144 STM32C5A3		
Layer: Bottom Solder	Gerber: .GBS	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	



Project: NUCLEO-144 STM32C5A3		
Layer: Bottom Overlay	Gerber: .GBO	
Variant: [No Variations]	MB2310	
Date: 2025-Sep-03	Rev: B	

THE COMPONENTS WITH PLATED THROUGH HOLE (PTH) MAY BE WELDED (CABLED) IN "PIN-IN-PASTE" MODE (IF NECESSARY)

PCB SPECIFICATIONS :

- A. MATERIAL :

B. MATERIAL FAMILY :

C. SOLDERMASK COLOR :

D. SILKSCREEN COLOR :

E. SURFACE FINISH :

F. IMPEDANCE CONTROL :

G. THROUGH VIA :

H. STACK-UP :
- FR-4

N/A

☐ GREEN

☒ WHITE

☒ ENIG

☐ HASL

☐ NO
- ☐ TG-170

☒ TG-150

☐ TG-140
- ☒ WHITE

☐ YELLOW

☒ IMMERSION SILVER

☐ HASL (PB-FREE)

☒ YES (SEE IMPEDANCE TABLE FOR DETAIL INFORMATION)
- ☐ RED

☐ BLACK

☒ Blue ink PANTONE 2955

☐ IMMERSION TIN

☐ GOLDEN FINGER
- PLUG THE VIAS WHICH ARE COVERED WITH SOLDERMASK ONE OR TWO SIDE.

PLUG MATERIAL : ☒ SOLDERMASK ☐ NON-CONDUCTIVE EPOXY.

SEE LAYER STACK-UP SEQUENCE FOR OVERALL THICKNESS.

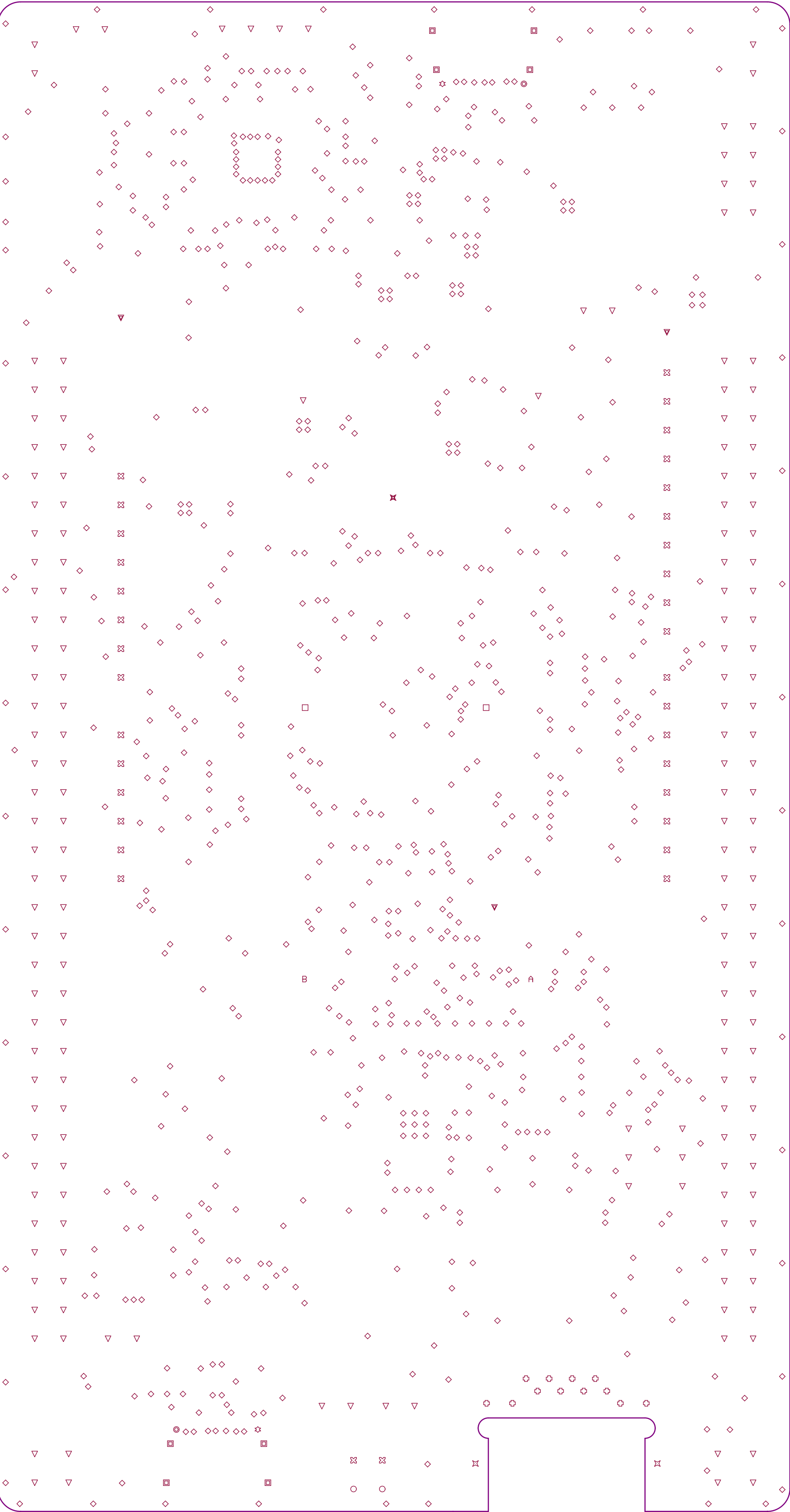
PCB : TYPE 3

ASPECT-RATIO, AXE Z :
6:1 to 8:1
LEVEL "B"

MINIMUM PARAMETERS

DEFAULT
TRACKS : 0.120mm
GAPS : 0.120mm

GAPS : 0.1mm UNDER
STLINK U2



Layer	Name	Material	Thickness	Constant	Board Layer Stack	Board Layer Stack
	Top Overlay					
	Top Solder	Solder Resist	0,015mm	3.5		
1	Top Layer		0,042mm			
	Dielectric 1	FR-4	0,090mm	4.2		
2	Signal Layer 1		0,035mm			
	Dielectric 2	FR-4	0,100mm	4.2		
3	Signal Layer 2		0,035mm			
	Dielectric 3	FR4	0,966mm	4.2		
4	Signal Layer 3		0,035mm			
	Dielectric4	FR-4	0,100mm	4.2		
5	Signal Layer 4		0,035mm			
	Dielectric5	FR-4	0,090mm	4.2		
6	Bottom Layer		0,042mm			
	Bottom Solder	Solder Resist	0,015mm	3.5		
	Bottom Overlay					

Symbol	Count	Hole Size	Plated	Hole Type	Drill Layer Pair	Via/Pad	Pad Shape	Template	Hole Length	Routed Path Length
B	1	1,150mm (45,28mil)	NPTH	Round	Top Layer - Bottom Layer	Pad	Rounded	c0hn115m10	-	-
A	1	1,650mm (64,96mil)	NPTH	Round	Top Layer - Bottom Layer	Pad	Rounded	c0hn165m10	-	-
X	1	4,150mm (163,39mil)	PTH	Round	Top Layer - Bottom Layer	Pad	Rounded	c600h415m610	-	-
o	2	0,650mm (25,59mil)	NPTH	Round	Top Layer - Bottom Layer	Pad	Rounded	c0hn65m10	-	-
*	2	0,650mm (25,59mil)	NPTH	Slot	Top Layer - Bottom Layer	Pad	Rounded	c0hn65_95m10	0,950mm (37,40mil)	0,300mm (11,81mil)
X	2	0,700mm (27,56mil)	PTH	Slot	Top Layer - Bottom Layer	Pad	Rounded	r280_130h70_220r65m290_140	2,200mm (86,61mil)	1,500mm (59,06mil)
O	2	1,100mm (43,31mil)	NPTH	Round	Top Layer - Bottom Layer	Pad	(Mixed)	(Mixed)	-	-
□	2	1,500mm (59,06mil)	NPTH	Round	Top Layer - Bottom Layer	Pad	Rounded	c0hn150m160(Tol3-3)	-	-
▼	3	3,200mm (125,98mil)	NPTH	Round	Top Layer - Bottom Layer	Pad	Rounded	c0hn320m20	-	-
■	8	0,500mm (19,69mil)	PTH	Slot	Top Layer - Bottom Layer	Pad	Rounded	r140_80h50_110r40m150_90	1,100mm (43,31mil)	0,600mm (23,62mil)
+	12	0,700mm (27,56mil)	PTH	Round	Top Layer - Bottom Layer	Pad	(Mixed)	(Mixed)	-	-
⊗	34	1,100mm (43,31mil)	PTH	Round	Top Layer - Bottom Layer	Pad	(Mixed)	(Mixed)	-	-
▽	182	1,000mm (39,37mil)	PTH	Round	Top Layer - Bottom Layer	Pad	Rounded	(Mixed)	-	-
◇	827	0,300mm (11,81mil)	PTH	Round	Top Layer - Bottom Layer	Via	Rounded	(Mixed)	-	-
	1079 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