View from Top side (Scale 2:1)

SNES TST Main
Rev 0
15/10/2021

PPU2

IC17 C34 C35 C50 C55 R63 C32 C33 C30 C31 C26 R56 R54 R48 R51 R49 C27 FB3 R25 R23 R33
IC16 R57 R53 R52 C14
R75 R76 R73 R58 R66 IC15 IC13 C25 IC9
R72 R71 R74 R60 R65 R45 R46 C20 R31
R78 FB4 R64 R59 IC7
R77 R79 JP5 R69 R70 JP4 R67 R68 JP3 R47 JP2 R44 JP1 R19 R5 R18 R30 C19
GND CS GND UI JP6 C4 R62 R61 C6 C3 C5 C12 Q1 R80
C37 R1 R81 Q2
IC18 IC1 R26
FB1 C36 R27
C15 R9 R10 R7 R6 R12 R14 R11 R13
IC2 C1 C11 C2 R38 R2 R3 R4
R40 R39

GL GO GC GD CO C1 C2 C3 MC L1 L2 L3 RG GND TDO TDI TMS TCK GND Vcc

View from Bottom side (Scale 2:1)

SHVC-CPU-XX
SNSP-CPU-XX

R15 FB2
R16
IC5 IC10
R35 C22
IC3 C16
IC8 D4 D3
C17 R24 J2 R32 R21 C13 R34 C10 C9
R17 R82 R83
C24 IC6 R8 Q3
R37 R11
R43 R13 C8 D2 C7 D1
IC12 R28 R29 C18 C14 R36 C23
R20 R21 IC11
R41 R42

SNS-CPU-APU-XX
SNS-CPU-RGB-XX
SNS-CPU-GPM-XX

View from Front side (Scale 3:2)

5.89mm

62.00mm

12.50mm   21.50mm

2.00mm

R1.00mm   R1.00mm

2.00mm

41.00mm

CFPS-73

R1.00mm   3.50mm

15.75mm

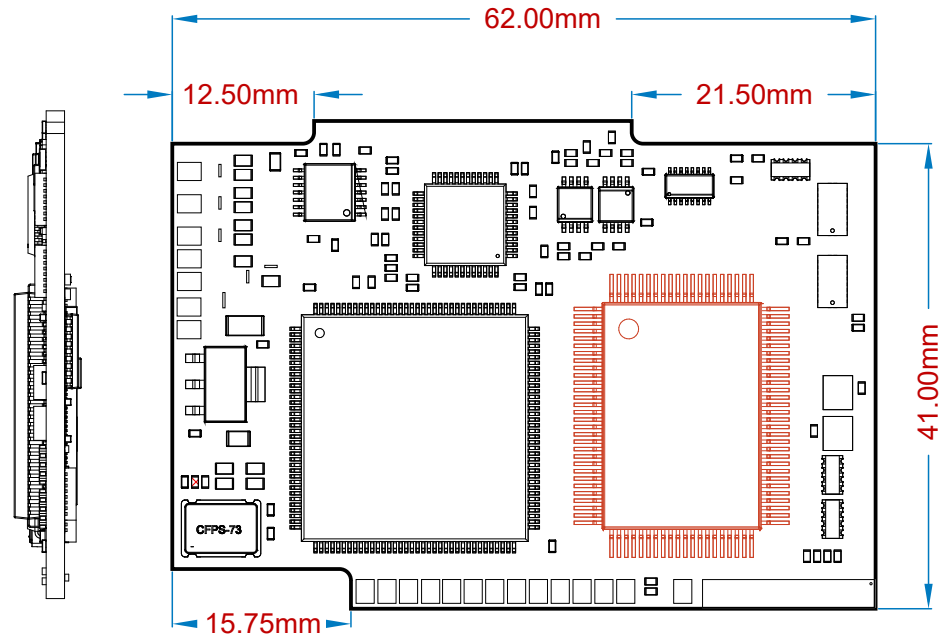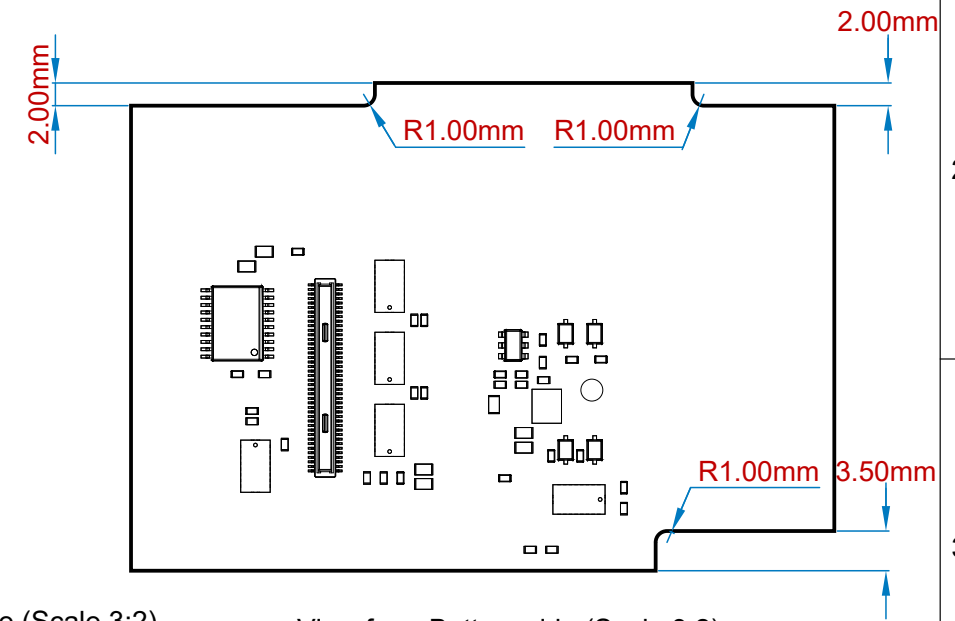**View from Right side (Scale 3:2)**   **View from Top side (Scale 3:2)**   **View from Left side (Scale 3:2)**   **View from Bottom side (Scale 3:2)**
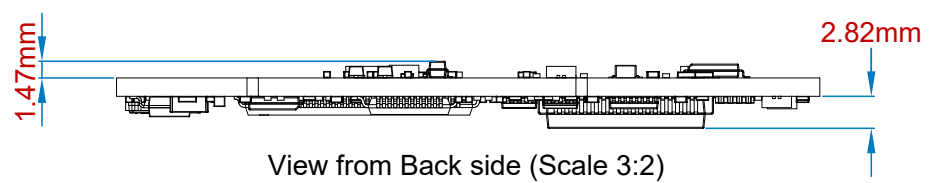
1.47mm   2.82mm

View from Back side (Scale 3:2)

View from Top side (Scale 3:2)
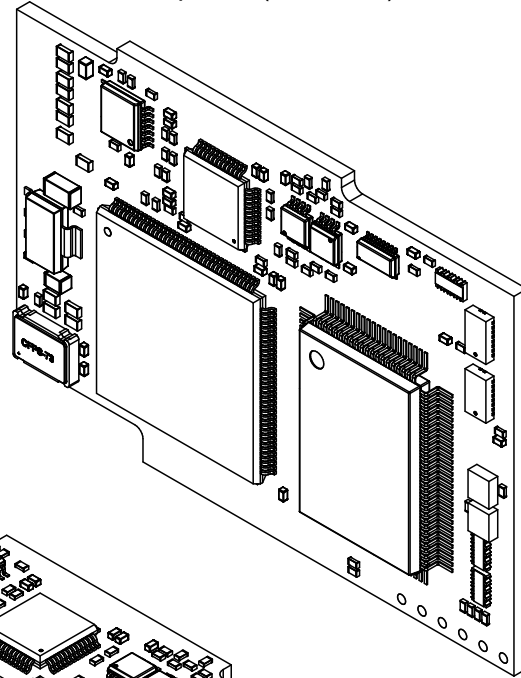
View from Bottom side (Scale 3:2)
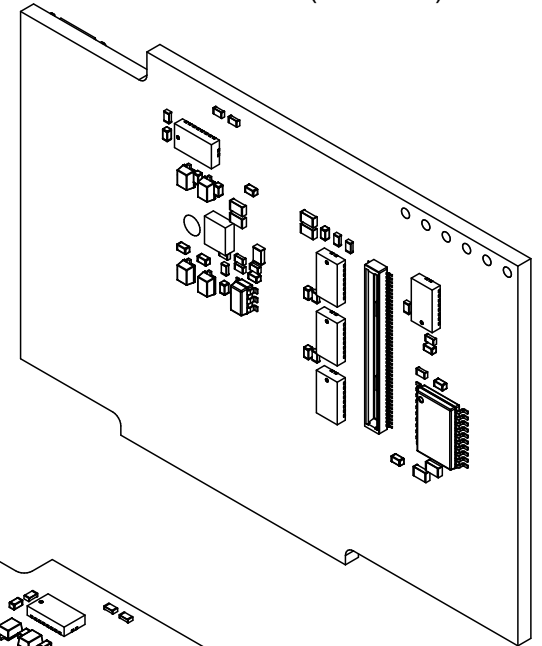
View from Front side (Scale 3:2)
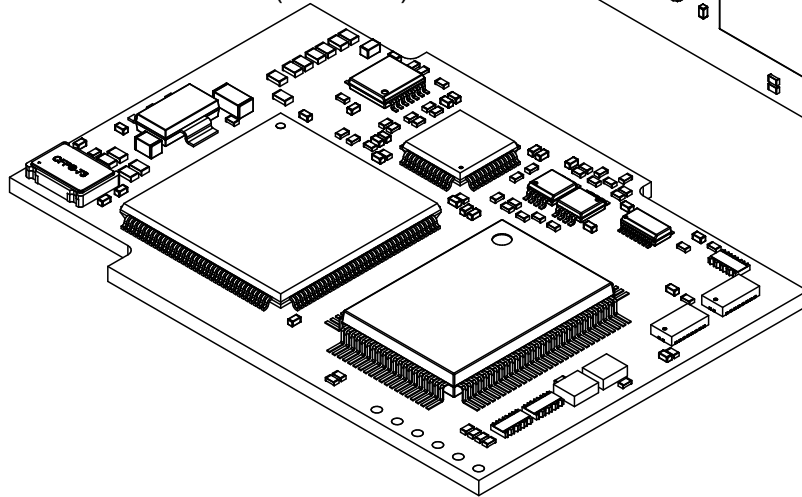
View from Back side (Scale 3:2)
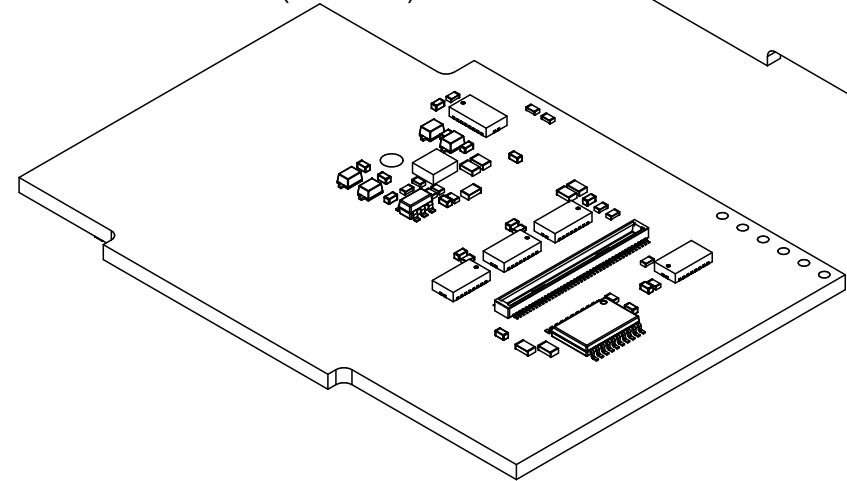
Project:	*SNES TST*		
Size: A4	Sheet: 3 of 6		Rev: Rev 0
Date: 15/10/2021	Time: 22:25	By: Opatus	

Realistic View

Realistic View

Top Layer (Scale 1:1)
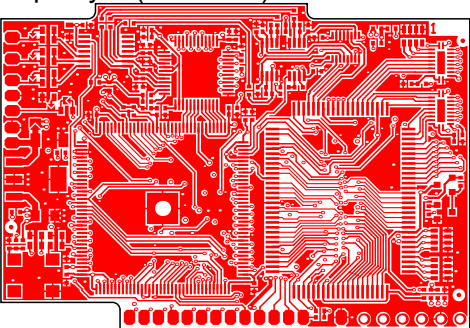
Ground Layer (Scale 1:1)
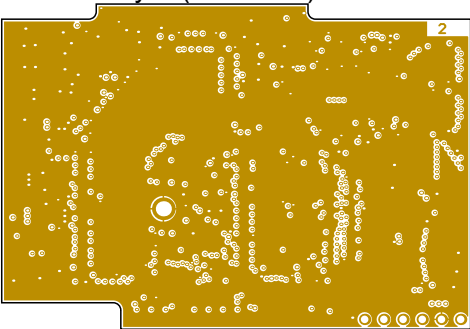
Power Layer (Scale 1:1)
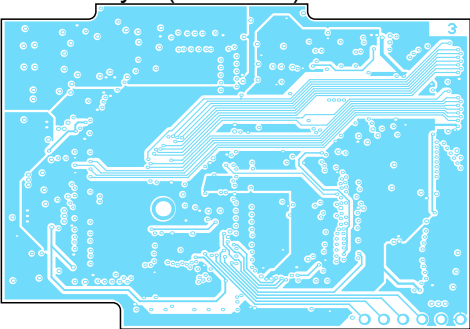
Bottom Layer (Scale 1:1)
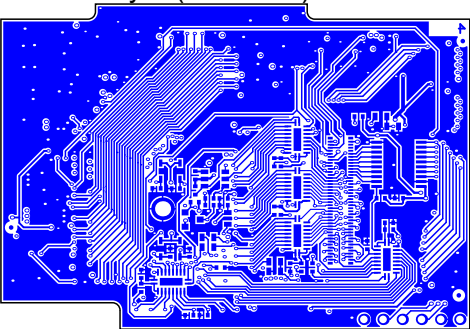
Project:	*SNES TST*		
Size: A4	Sheet: 4 of 6		Rev: Rev 0
Date: 15/10/2021	Time: 22:25	By:	Opatus

Bill Of Materials SNES TST NTSC System Variant

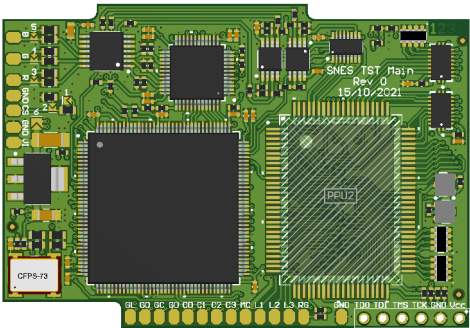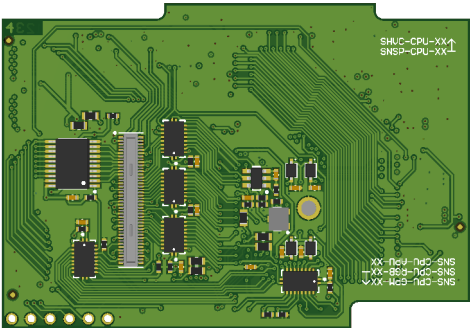| Pos #	Quantity	Designator	Value	Tolerance	Nominal Voltage	Dielectric	Footprint	Vendor	Part Number
1	27	C1, C2, C3, C4, C5, C6, C11, C12, C13, C14, C15, C16, C17, C18, C19, C20, C21, C22, C23, C24, C25, C26, C27, C28, C29, C30, C32	100nF	+-20%	10V	X7R	Cap_0402_Chip		
2	4	C7, C8, C9, C10	10pF	+-20%	10V	X7R	Cap_0402_Chip		
3	3	C31, C33, C34	10nF	+-20%	10V	X7R	Cap_0402_Chip		
4	1	C35	1uF	+-20%	10V	X7R	Cap_0603_Chip		
5	1	C36	10uF	+-20%	10V	X7R	Cap_0805_Chip		
6	1	C37	10uF	+-20%	25V	X7R	Cap_1206_Chip		
7	4	D1, D2, D3, D4	Schottky Diode				SOD323	Diodes	BAT54WS-7-F
8	4	FB1, FB2, FB3, FB4	1800Ohm 200mA				Ind_0402_Chip	TDK	MMZ1005S182ET000
9	1	IC1	10M04SAE144C8G				EQFP-144_A:1P65_	Intel	10M08SAE144C8G
10	1	IC2	17.734475 MHz				Quarz 7.5mm	IQD Frequency	LFSPXO020648Bulk
11	1	IC3	TMUX1219				SOT23-6	Texas Instruments	TMUX1219DBVR
12	1	IC5	SN74HCT541				TSSOP20 Narrow	Texas Instruments	SN74HCT541PW
13	7	IC6, IC7, IC8, IC9, IC10, IC11, IC12	LSF0108				VQFN20	Texas Instruments	LSF0108RKS
14	2	IC13, IC15	OPA2356				MSOP8	Analog Devices	OPA2356AIDGK
15	1	IC14	TMUX1574				SOT-23THIN16	Texas Instruments	TMUX1574DYYR
16	1	IC16	ADV7123				ST_48_ADI	Analog Devices Inc	ADV7123KSTZ50
17	1	IC17	THS7374				TSSOP14	Texas Instruments	THS7374IPW
18	1	IC18	MCP1703T				SOT223-3	Microchip	MCP1703T-3302E/DB
19	1	J2	80Pole Connector				DF40C-80DP	Hirose Connector	DF40C-80DP-0.4V(51)
20	1	Q1	IRLML6402				SOT23_FET	Diodes	IRLML6402
21	1	Q2	MMBT3904				SOT23_Transistor	Diodes	MMBT3904
22	1	Q3	BSS138				SOT23_FET	Infenion	BSS138
23	6	R1, R4, R28, R50, R55, R63	1k	+-1%			Res_0402_Chip		
24	12	R2, R3, R5, R17, R18, R19, R41, R42, R43, R58, R66, R78	10k	+-1%			Res_0402_Chip		
25	5	R6, R7, R12, R14, R44	470R	+-1%			Res_0603_Chip		
26	4	R8, R11, R13, R21	300R	+-1%			Res_0603_Chip		
27	4	R9, R49, R54, R60	0R				Res_0402_Chip		
28	2	R15, R20	33R	+-1%			Res_0603_Chip		
29	1	R16	100R	+-1%			Res_0603_Chip		
30	8	R22, R24, R25, R33, R34, R38, R39, R40	1.8k	+-1%			Res_0402_Chip		
31	3	R23, R26, R27	10k	+-1%			1206_Array_Chip		
32	7	R29, R30, R31, R32, R35, R36, R37	200k	+-1%			Res_0402_Chip		
33	1	R45	1.24k	+-1%			Res_0402_Chip		
34	4	R46, R52, R57, R65	619R	+-1%			Res_0402_Chip		
35	1	R47	91R	+-1%			Res_0603_Chip		
36	4	R48, R53, R59, R81	100k	+-1%			Res_0402_Chip		
37	3	R51, R56, R64	237R	+-1%			Res_0402_Chip		
38	1	R61	470R	+-1%			Res_0402_Chip		
39	1	R62	11R	+-1%			Res_0402_Chip		
40	6	R67, R68, R69, R70, R77, R79	75R	+-1%			Res_0603_Chip		
41	6	R71, R72, R73, R74, R75, R76	75R	+-1%			Res_0402_Chip		
42	3	R80, R82, R83	3.3k	+-1%			Res_0402_Chip		

Bill Of Materials SNES TST PAL System Variant

Pos #	Quantity	Designator	Value	Tolerance	Nominal Voltage	Dielectric	Footprint	Vendor	Part Number
1	27	C1, C2, C3, C4, C5, C6, C11, C12, C13, C14, C15, C16, C17, C18, C19, C20, C21, C22, C23, C24, C25, C26, C27, C28, C29, C30, C32	100nF	+-20%	10V	X7R	Cap_0402_Chip		
2	4	C7, C8, C9, C10	10pF	+-20%	10V	X7R	Cap_0402_Chip		
3	3	C31, C33, C34	10nF	+-20%	10V	X7R	Cap_0402_Chip		
4	1	C35	1uF	+-20%	10V	X7R	Cap_0603_Chip		
5	1	C36	10uF	+-20%	10V	X7R	Cap_0805_Chip		
6	1	C37	10uF	+-20%	25V	X7R	Cap_1206_Chip		
7	4	D1, D2, D3, D4	Schottky Diode				SOD323	Diodes	BAT54WS-7-F
8	4	FB1, FB2, FB3, FB4	1800Ohm 200mA				Ind_0402_Chip	TDK	MMZ1005S182ET000
9	1	IC1	10M04SAE144C8G				EQFP-144_A:1P65_	Intel	10M08SAE144C8G
10	1	IC2	14.318180 MHz				Quarz 7.5mm	IQD Frequency	LFSPXO018538Reel
11	1	IC3	TMUX1219				SOT23-6	Texas Instruments	TMUX1219DBVR
12	1	IC5	SN74HCT541				TSSOP20 Narrow	Texas Instruments	SN74HCT541PW
13	7	IC6, IC7, IC8, IC9, IC10, IC11, IC12	LSF0108				VQFN20	Texas Instruments	LSF0108RKS
14	2	IC13, IC15	OPA2356				MSOP8	Analog Devices	OPA2356AIDGK
15	1	IC14	TMUX1574				SOT-23THIN16	Texas Instruments	TMUX1574DYYR
16	1	IC16	ADV7123				ST_48_ADI	Analog Devices Inc	ADV7123KSTZ50
17	1	IC17	THS7374				TSSOP14	Texas Instruments	THS7374IPW
18	1	IC18	MCP1703T				SOT223-3	Microchip	MCP1703T-3302E/DB
19	1	J2	80Pole Connector				DF40C-80DP	Hirose Connector	DF40C-80DP-0.4V(51)
20	1	Q1	IRLML6402				SOT23_FET	Diodes	IRLML6402
21	1	Q2	MMBT3904				SOT23_Transistor	Diodes	MMBT3904
22	1	Q3	BSS138				SOT23_FET	Infenion	BSS138
23	6	R1, R4, R28, R50, R55, R63	1k	+-1%			Res_0402_Chip		
24	12	R2, R3, R5, R17, R18, R19, R41, R42, R43, R58, R66, R78	10k	+-1%			Res_0402_Chip		
25	5	R6, R7, R12, R14, R44	470R	+-1%			Res_0603_Chip		
26	4	R8, R11, R13, R21	300R	+-1%			Res_0603_Chip		
27	4	R10, R49, R54, R60	0R				Res_0402_Chip		
28	2	R15, R20	33R	+-1%			Res_0603_Chip		
29	1	R16	100R	+-1%			Res_0603_Chip		
30	8	R22, R24, R25, R33, R34, R38, R39, R40	1.8k	+-1%			Res_0402_Chip		
31	3	R23, R26, R27	10k	+-1%			1206_Array_Chip		
32	7	R29, R30, R31, R32, R35, R36, R37	200k	+-1%			Res_0402_Chip		
33	1	R45	1.24k	+-1%			Res_0402_Chip		
34	4	R46, R52, R57, R65	619R	+-1%			Res_0402_Chip		
35	1	R47	91R	+-1%			Res_0603_Chip		
36	4	R48, R53, R59, R81	100k	+-1%			Res_0402_Chip		
37	3	R51, R56, R64	237R	+-1%			Res_0402_Chip		
38	1	R61	470R	+-1%			Res_0402_Chip		
39	1	R62	11R	+-1%			Res_0402_Chip		
40	6	R67, R68, R69, R70, R77, R79	75R	+-1%			Res_0603_Chip		
41	6	R71, R72, R73, R74, R75, R76	75R	+-1%			Res_0402_Chip		
42	3	R80, R82, R83	3.3k	+-1%			Res_0402_Chip		