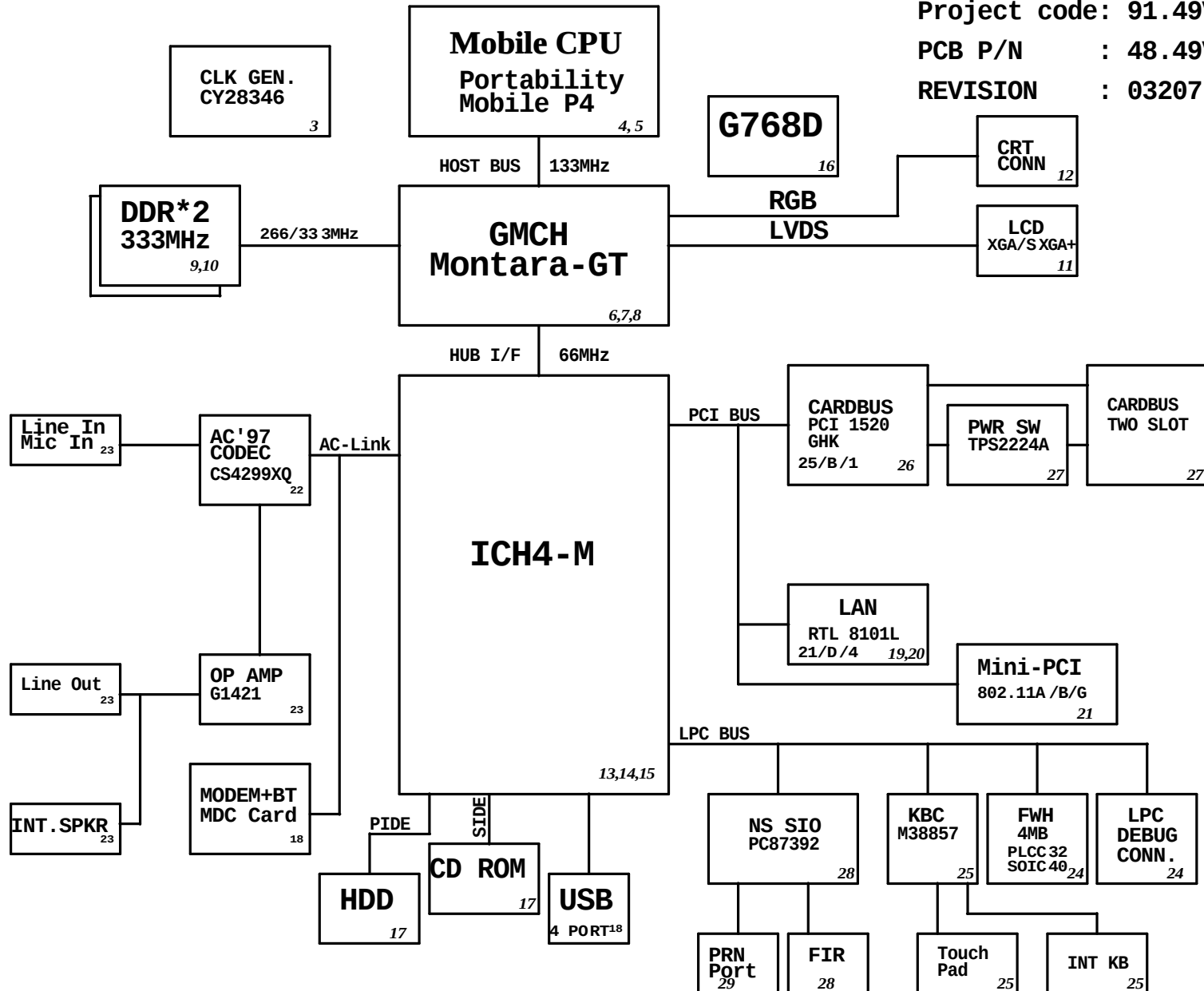


YUHINA Block Diagram

Project code: 91.49V01.001

PCB P/N : 48.49V01.0SC

REVISION : 03207-SC



SYSTEM DC/DC		33
INPUTS	OUTPUTS	
DCBATO UT	5V_ S5	
	5V_ S3	
	5V_ S0	
	3D3V_ S5	
	3D3V_ S3	
	3D3V_ S0	
	3D3V_ LAN AC	
SYSTEM DC/DC		30
INPUTS	OUTPUTS	
DCBATO UT	2D5V_ S3	
	1D5V_ S0	
LP2996		30
2D5V_ S3	1D25V_ S0	

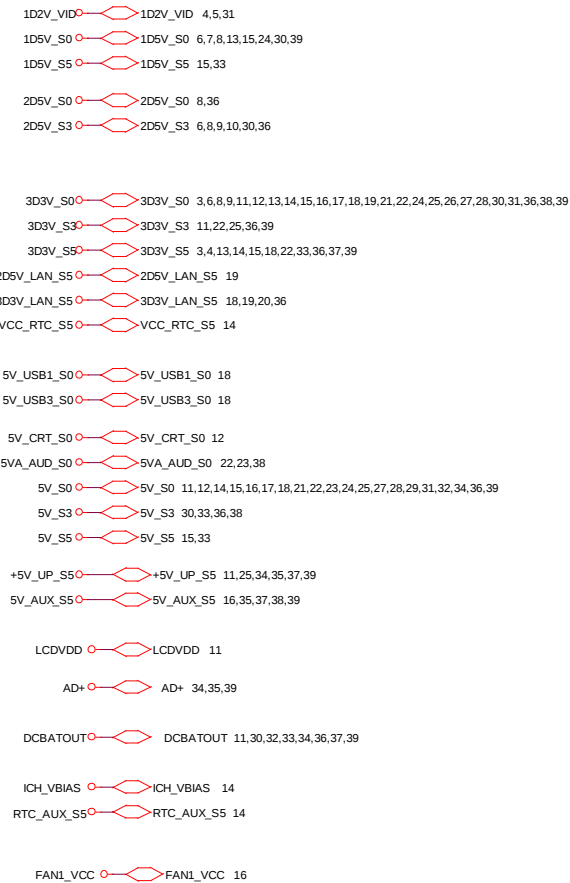
MAXIM CHARGER MAX1645 34	
INPUTS	OUTPUTS
DCBATO UT	BT+ 18V 4.0A UP+5V 5V 100mA

PCB LAYER
L1: Signal 1
L2: VCC/GND
L3: Signal 2
L4: Signal 3
L5: GND
L6: Signal 4

緯創資通

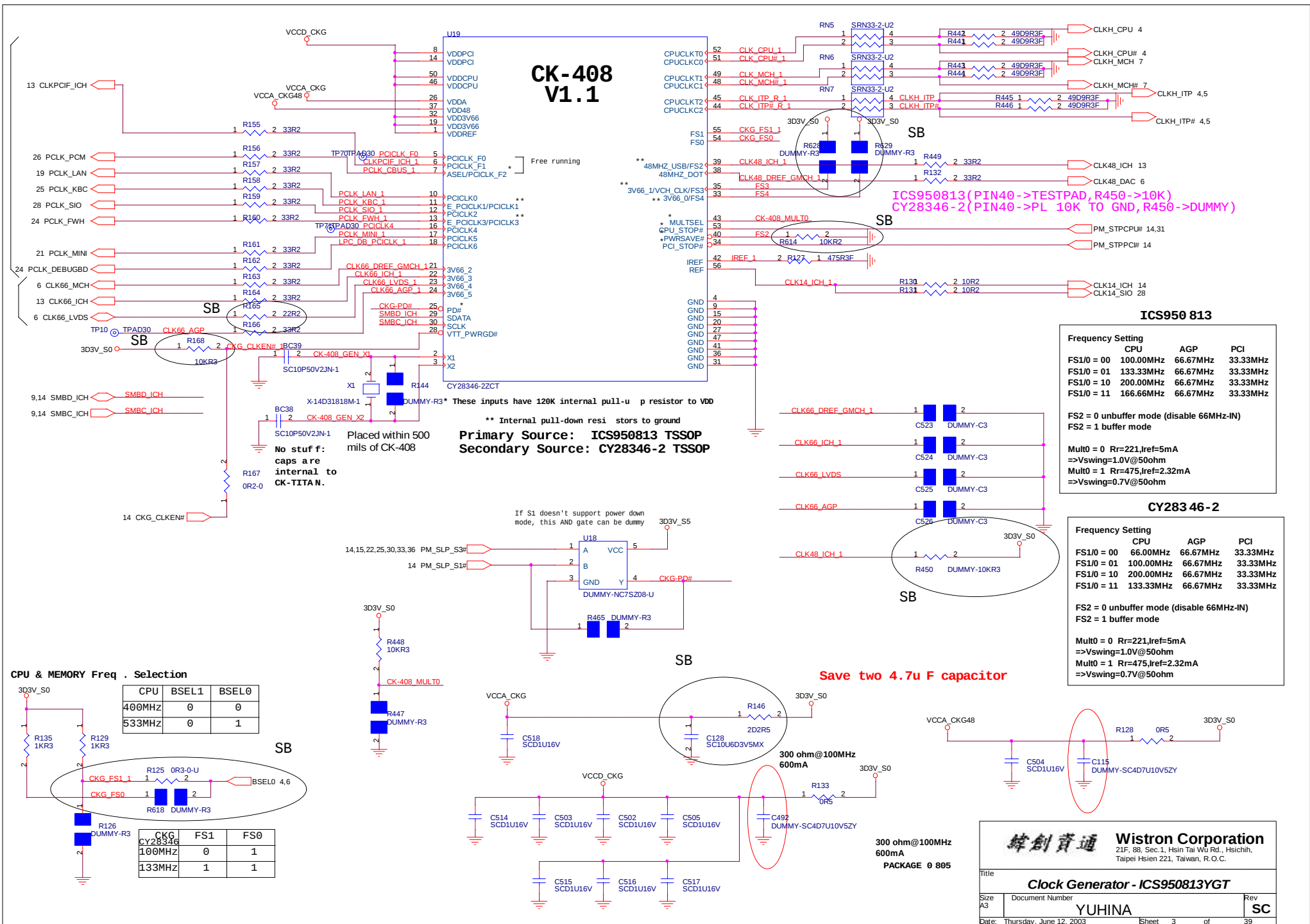
Wistron Corporation
21F, 88, Sec.1, Hsin Tai Wu Rd., Hsichih,
Taipei Hsien 221, Taiwan, R.O.C.

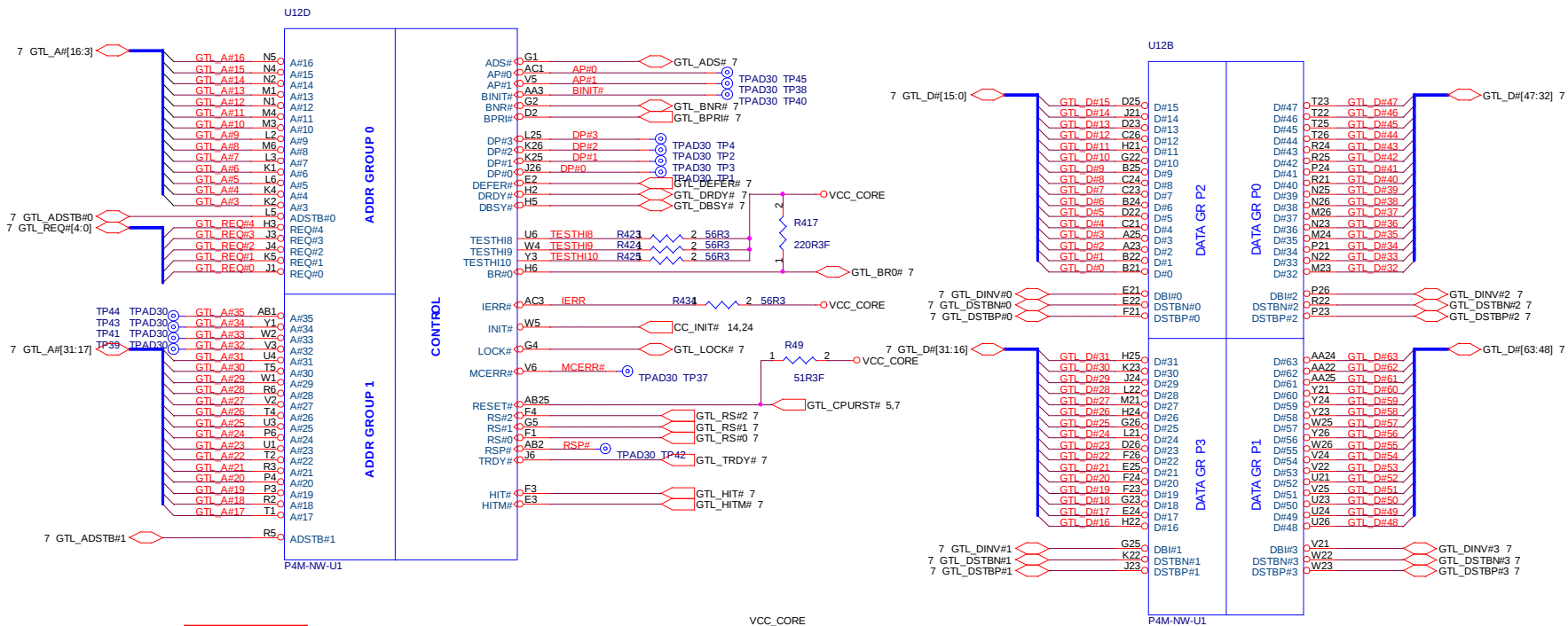
Title			
BLOCK DIAGRAM			
Size Custom	Document Number		Rev
	YUHINA		SC
Date:	Monday, April 28, 2003	Sheet 1 of	39



PCI DEVICE RESOURCE ASSIGNMENT

	BUS	DEVICE	IDSEL	PCI_REQ#	PCI_GNT#	INT_IRQ#
LAN	1	5	PCI_AD26	REQ#4	GNT#4	IRQD#
CardBus	1	9	PCI_AD20	REQ#1	GNT#1	IRQB#/IRQA#
MiniPCI	1	6	PCI_AD21	REQ#2	GNT#2	IRQE#





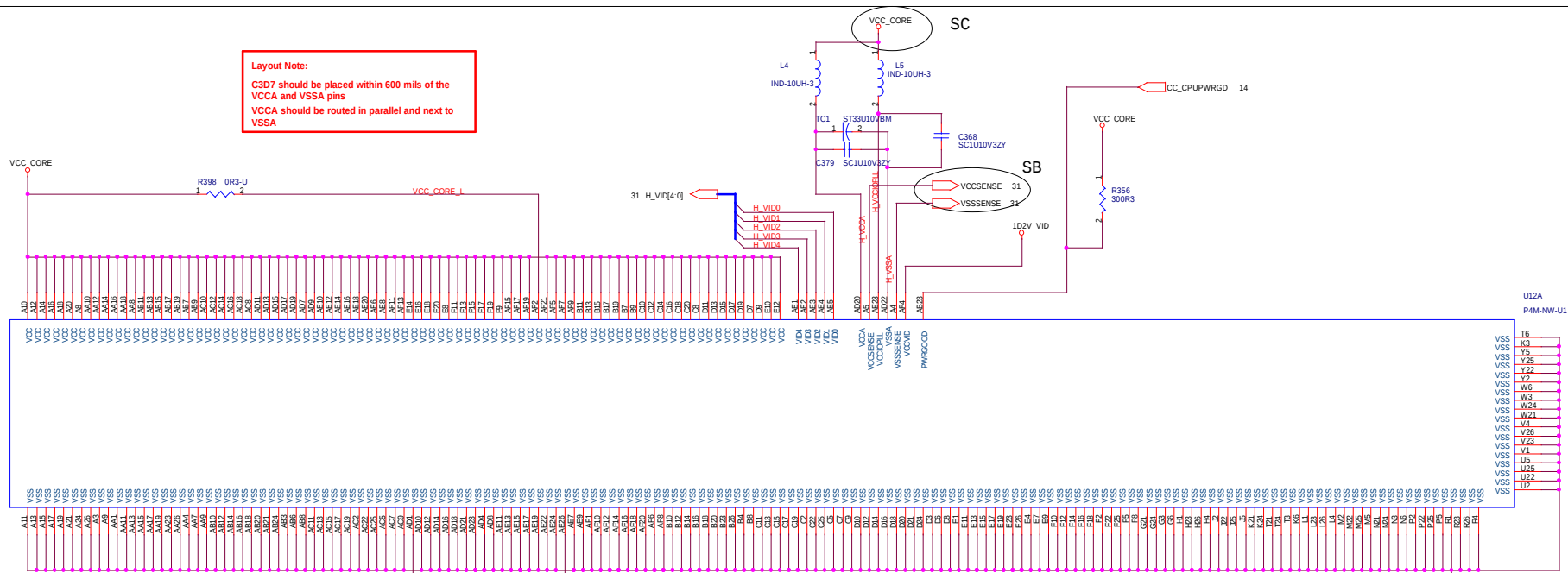
Note: Host Clock terminations are at the source (CK408)

Trace length: Less than 1.5 inch

Trace 25 mils Mini.

P4: R433 -> DUMMY
Prescott: R433 -> 0ohm

Layout Note:
C3D7 should be placed within 600 mils of the
VCCA and VSSA pins
VCCA should be routed in parallel and next to
VSSA

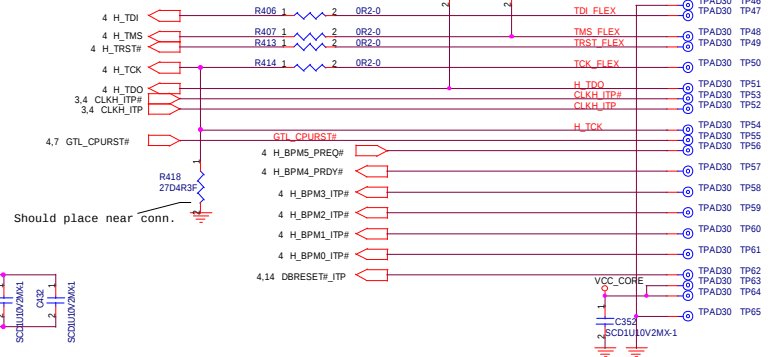
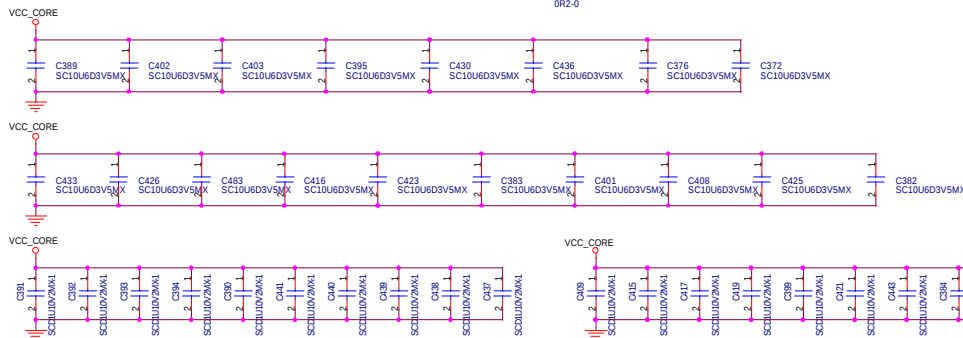


GDN: 50 ohm platform
NC: 60 ohm platform

ITP Debug Pad

10U/X5R 1206 DECOUPLING CAPS
8X IN SOCKET CAVITY
10X IN CRB

0.1U/X5R 0603 DECOUPLING CAPS
20X AROUND SOCKET



GND

Original use 150uF 6.3V

Original use 220uF 6V

Original use 47uF 4V

Original use 47uF 4V

Original use 22uF

POWER

Original use 220uF

Original use 150uF X 2 6.3V

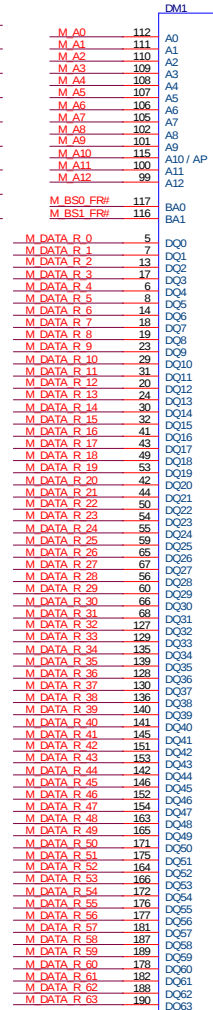
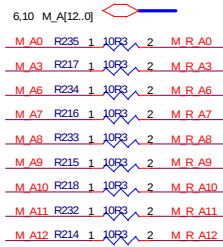
Original use 100uF 6.3V

Power Consumption

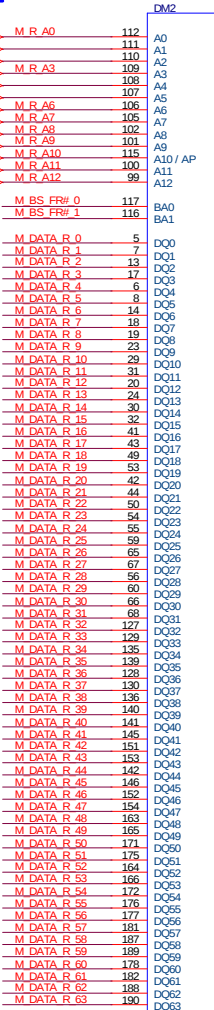
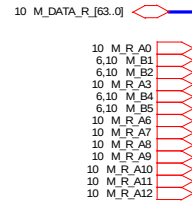
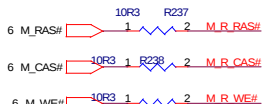
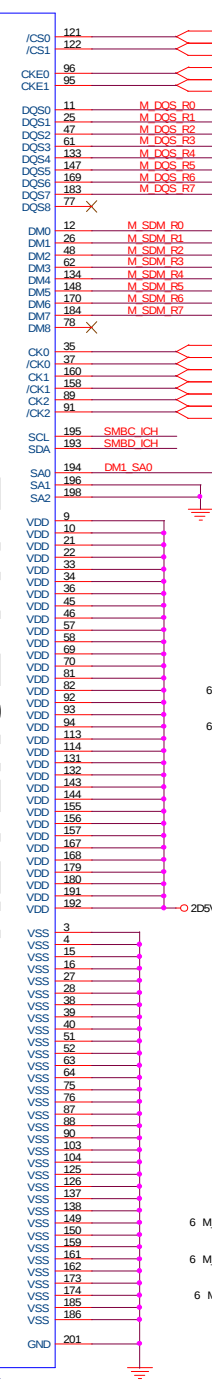
VCC-CORE_S0: 940mA
1D5V_S0: 3140mA
2D5V_S3: 2050mA
3D3V_S0: 20mA

緯創資通 Wistron Corporation
21F, 88, Sec.1, Hsin Tai Wu Rd., Hsichih,
Taipei Hsien 221, Taiwan, R.O.C.

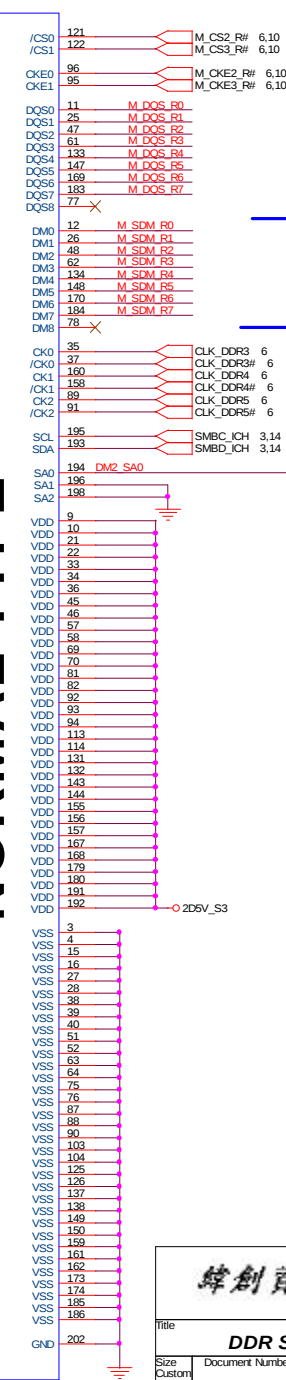
Title MONTARA GT (3/3)
Size A3 Document Number YUHINA Rev SC
Date: Thursday, June 12, 2003 Sheet 8 of 39



REVERSE TYPE

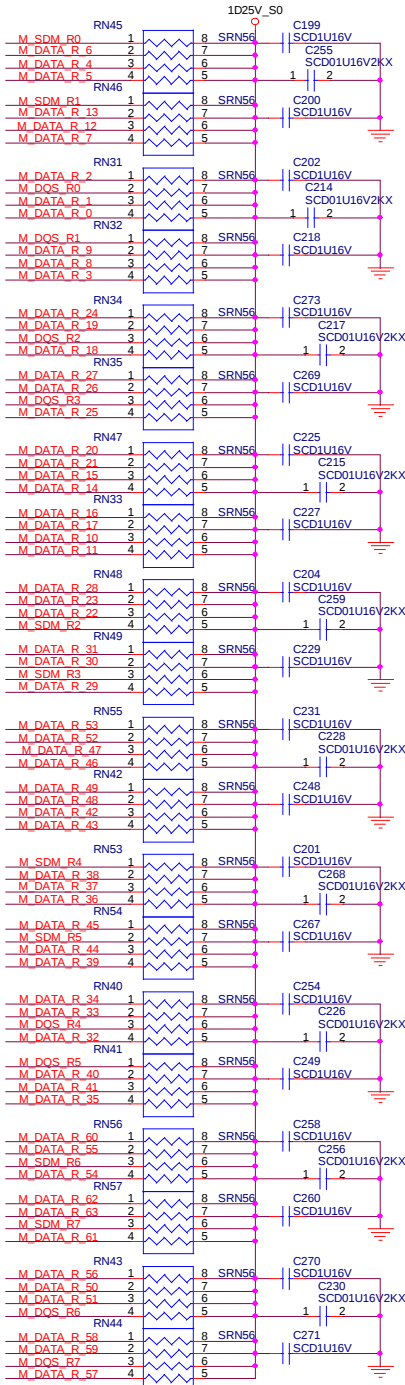
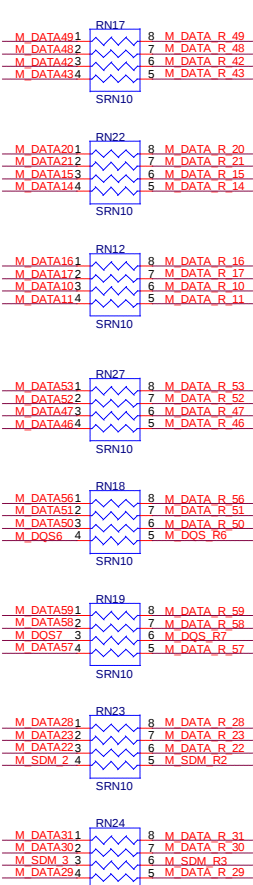
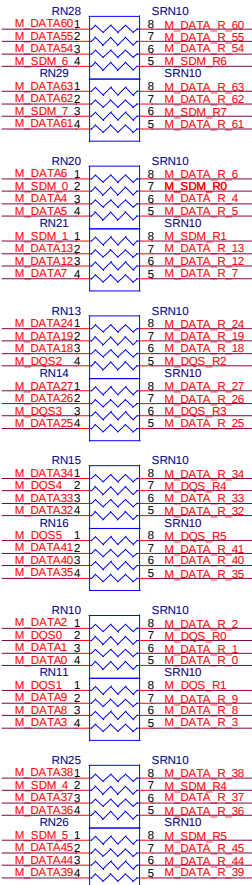


NORMAL TYPE



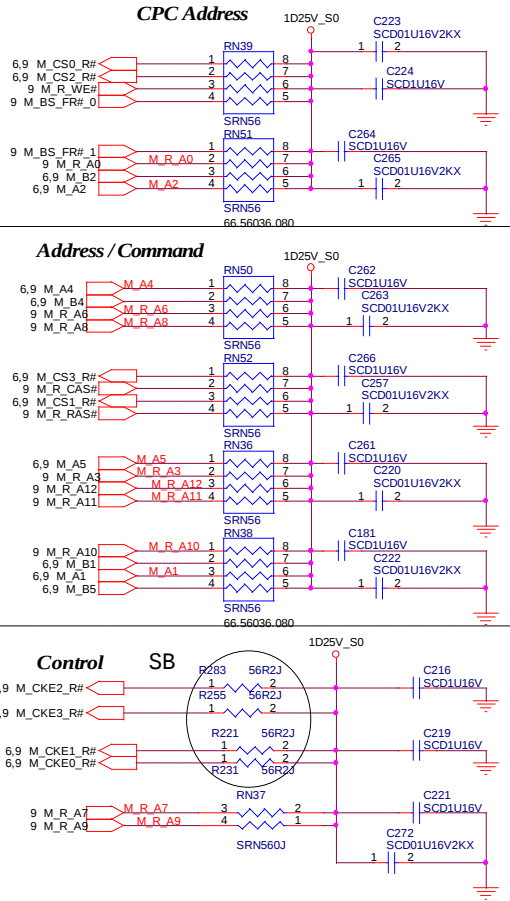
Title		Rev	
DDR Socket		SC	
Size	Document Number		
Custom	YUHINA		
Date:	Thursday, June 12, 2003	Sheet	9 of 39

SERIES DAMPING



PARALLEL TERMINATION

PULL HIGH STUBS < 0.8", PLACE RPs CLOSE TO DM2
NO EQUAL LENGTH LIMITATION



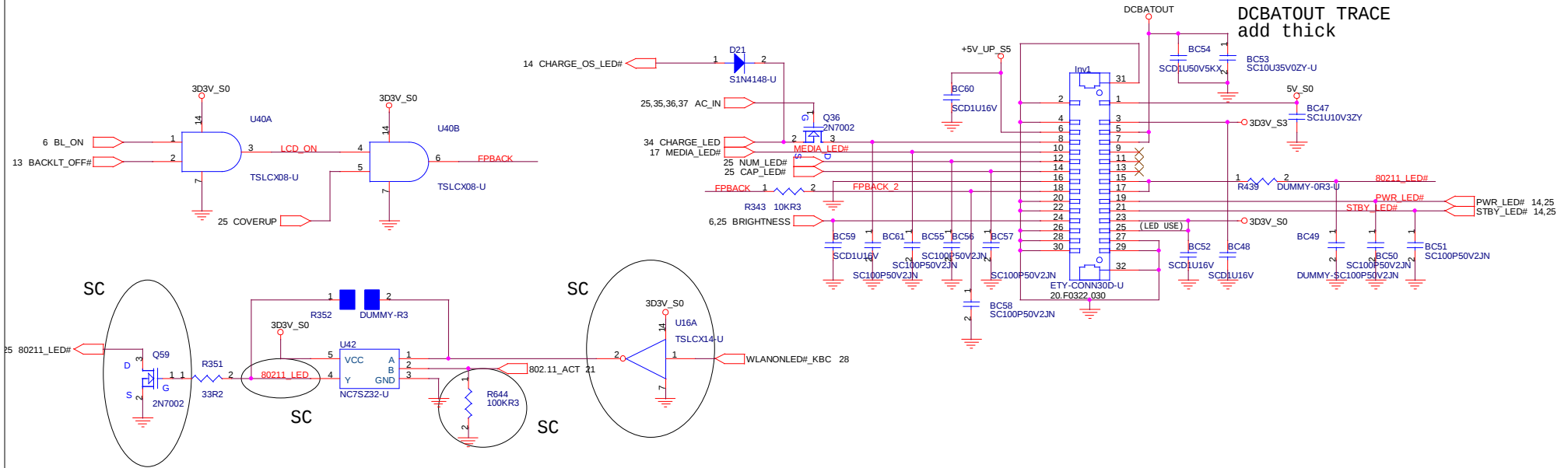
Wistron Corporation

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Title		
DDR Serial/Terminator Resistor		
Size	Document Number	Rev
A3	YUHINA	SC
Date: Thursday, June 12, 2003		
Sheet 10 of 39		

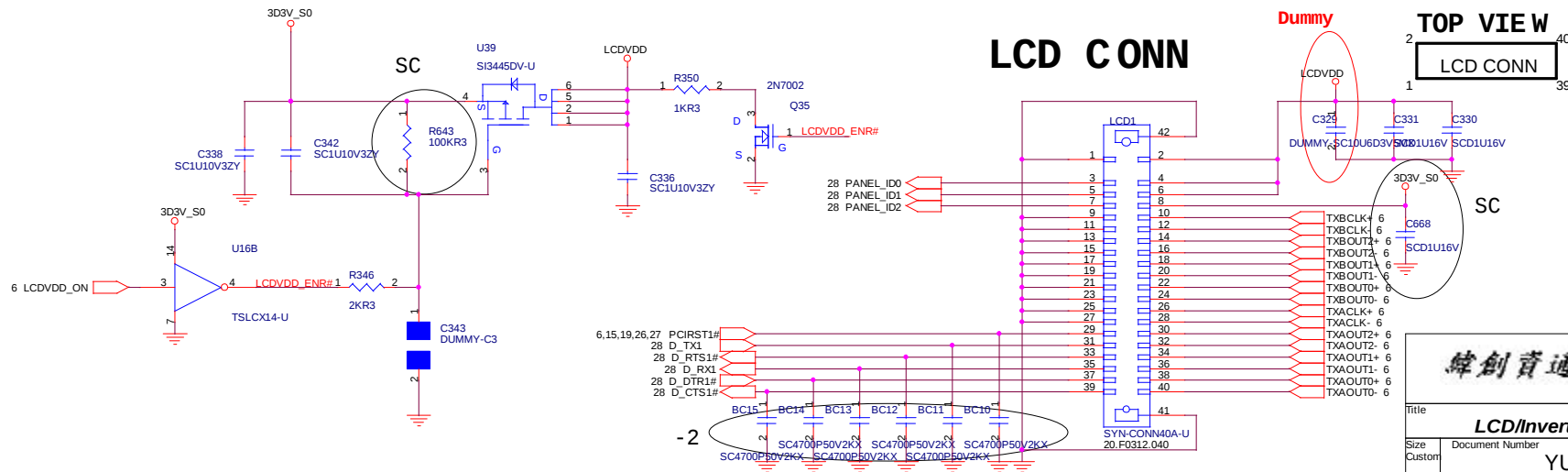
LCD / INVERTER INTERFACE

TOP VIEW
INV CONN



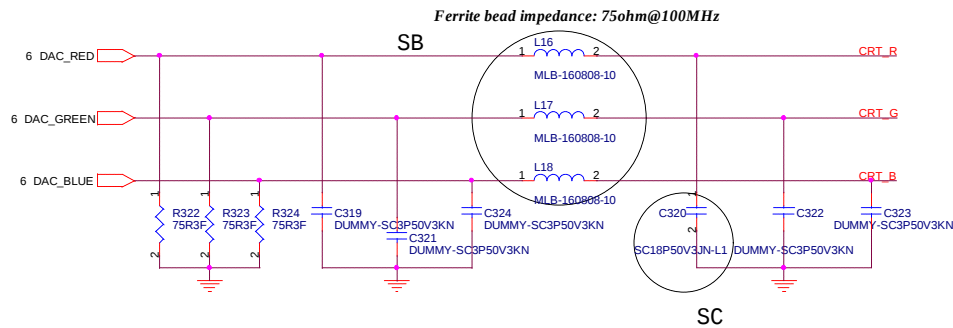
LCD CONN

Dummy
TOP VIEW
LCD CONN



緯創資通 Wistron Corporation 21F, 88, Sec.1, Hsin Tai Wu Rd., Hsichih, Taipei Hsien 221, Taiwan, R.O.C.	
Title LCD/Inverter Connector	
Size Custom	Document Number YUHINA
Date: Thursday, June 12, 2003	Sheet 11 of 39

CRT I/F & CONNECTOR

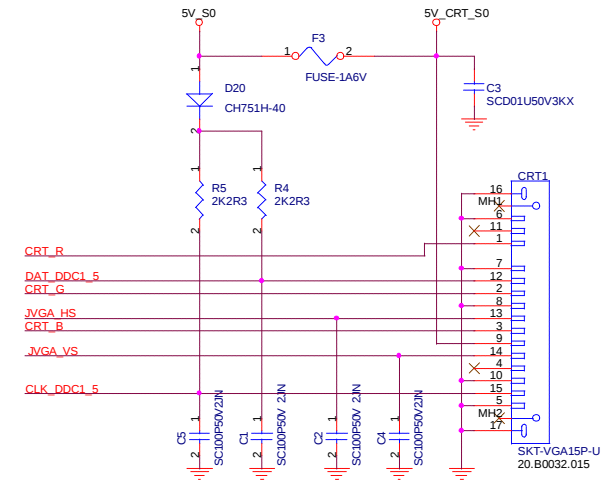


Layout Note:

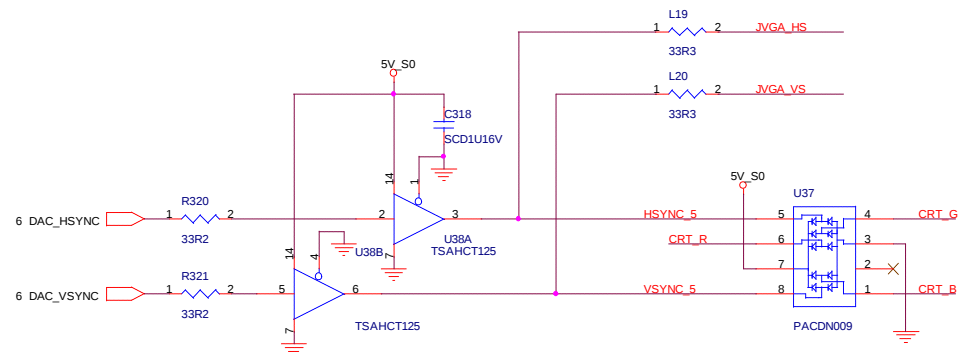
- * Must be a ground return path between this ground and the ground on the VGA connector.
- * 37.4_1% resistors must be placed at the same place as the RGB 75 Ohm pull-down resistors.

Pi-filter & 75 Ohm pull-down resistors should be as close as to CRT CONN. RGB will hit 75 Ohm first, pi-filter, then CRT CONN.

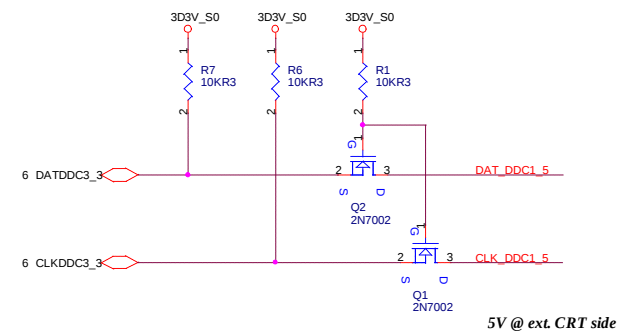
RDDP 1.0



Hsync & Vsync level shift



DDC_CLK & DATA level shift



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Title

CRT Connector

Size

Document Number

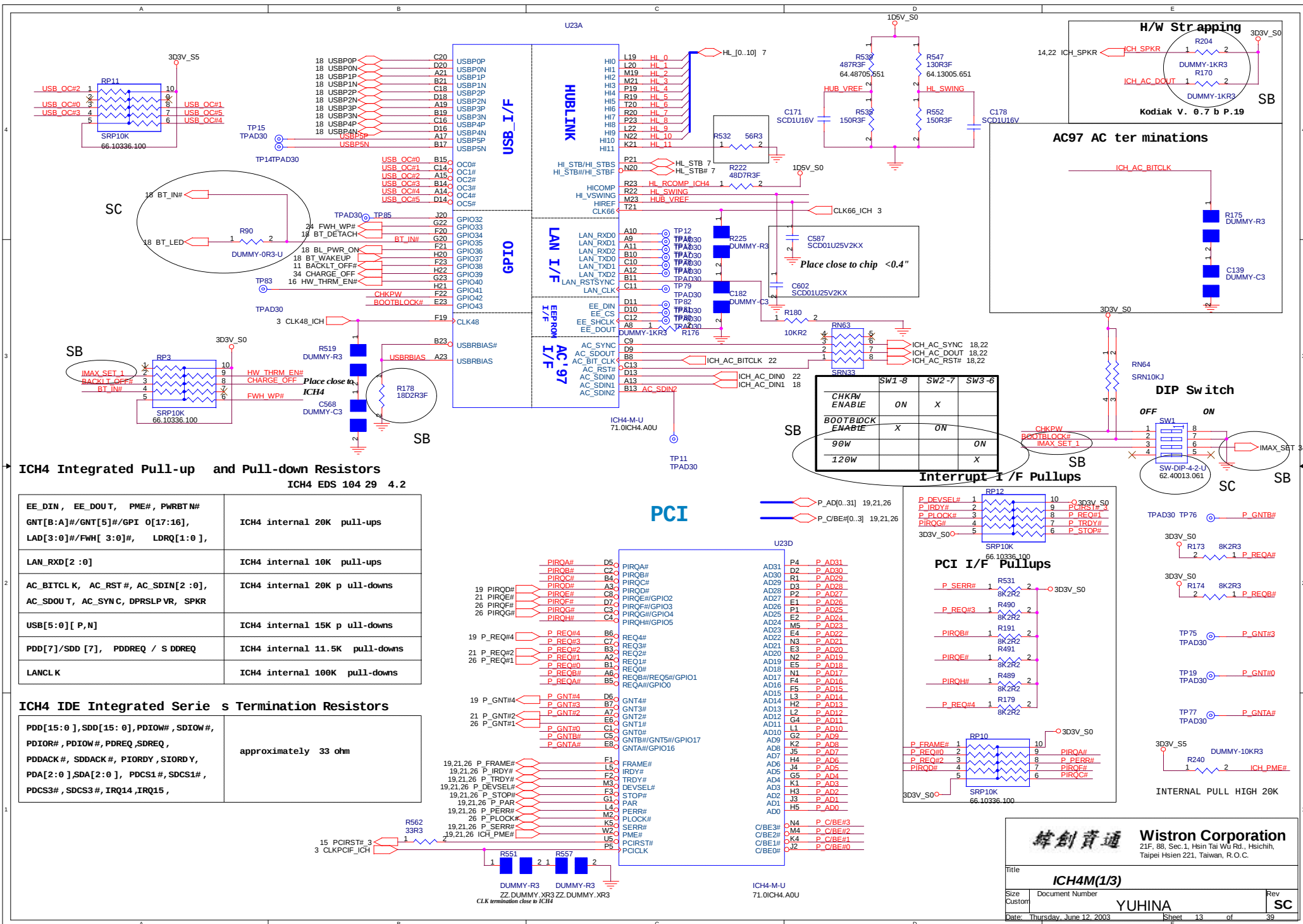
YUHINA

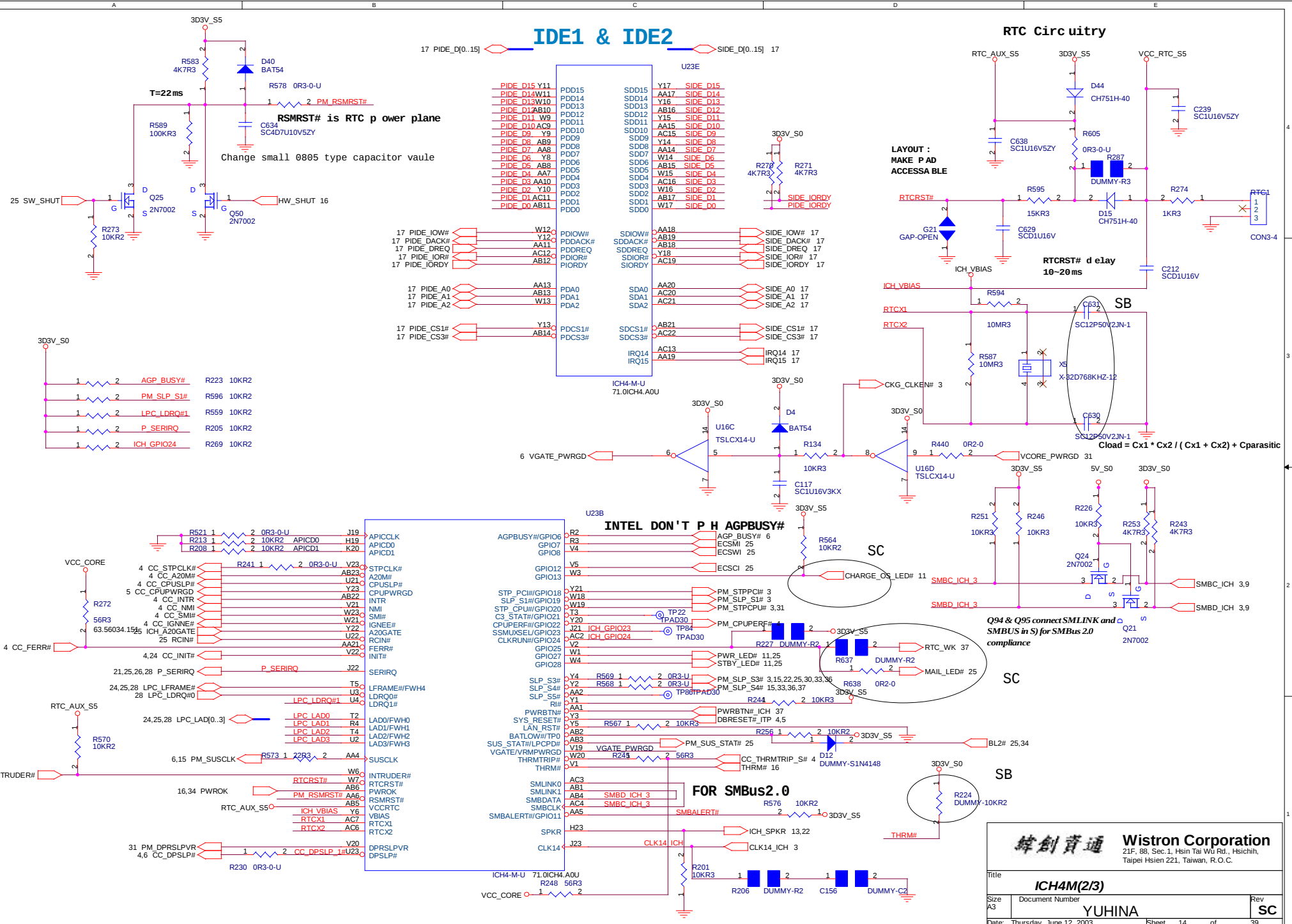
Rev

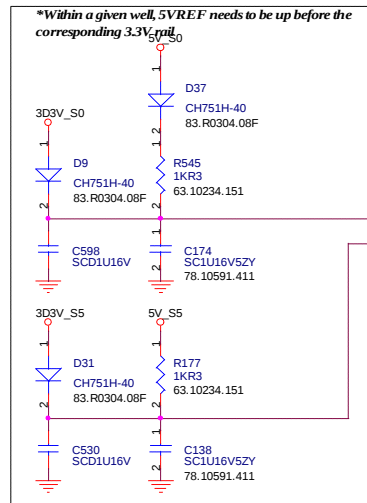
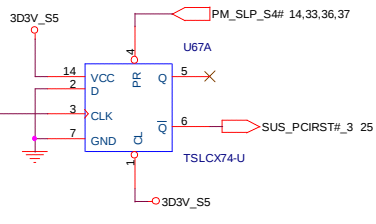
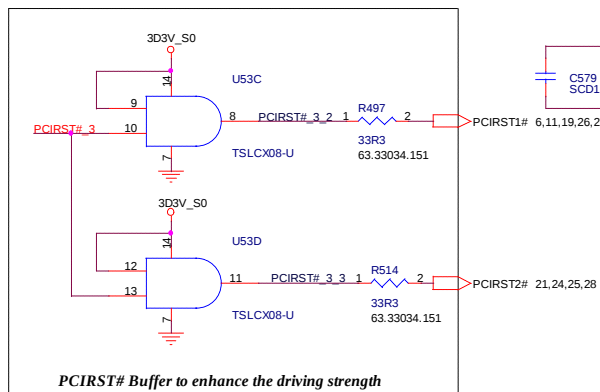
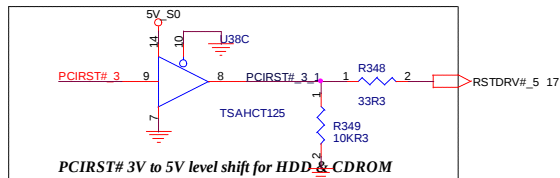
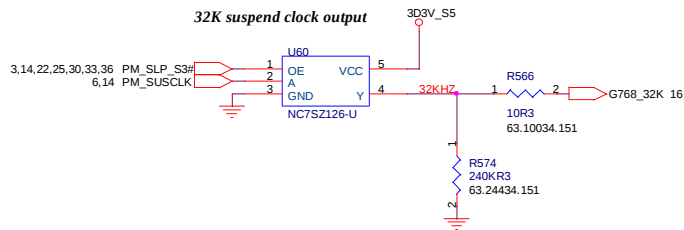
SC

Date: Thursday, June 12, 2003

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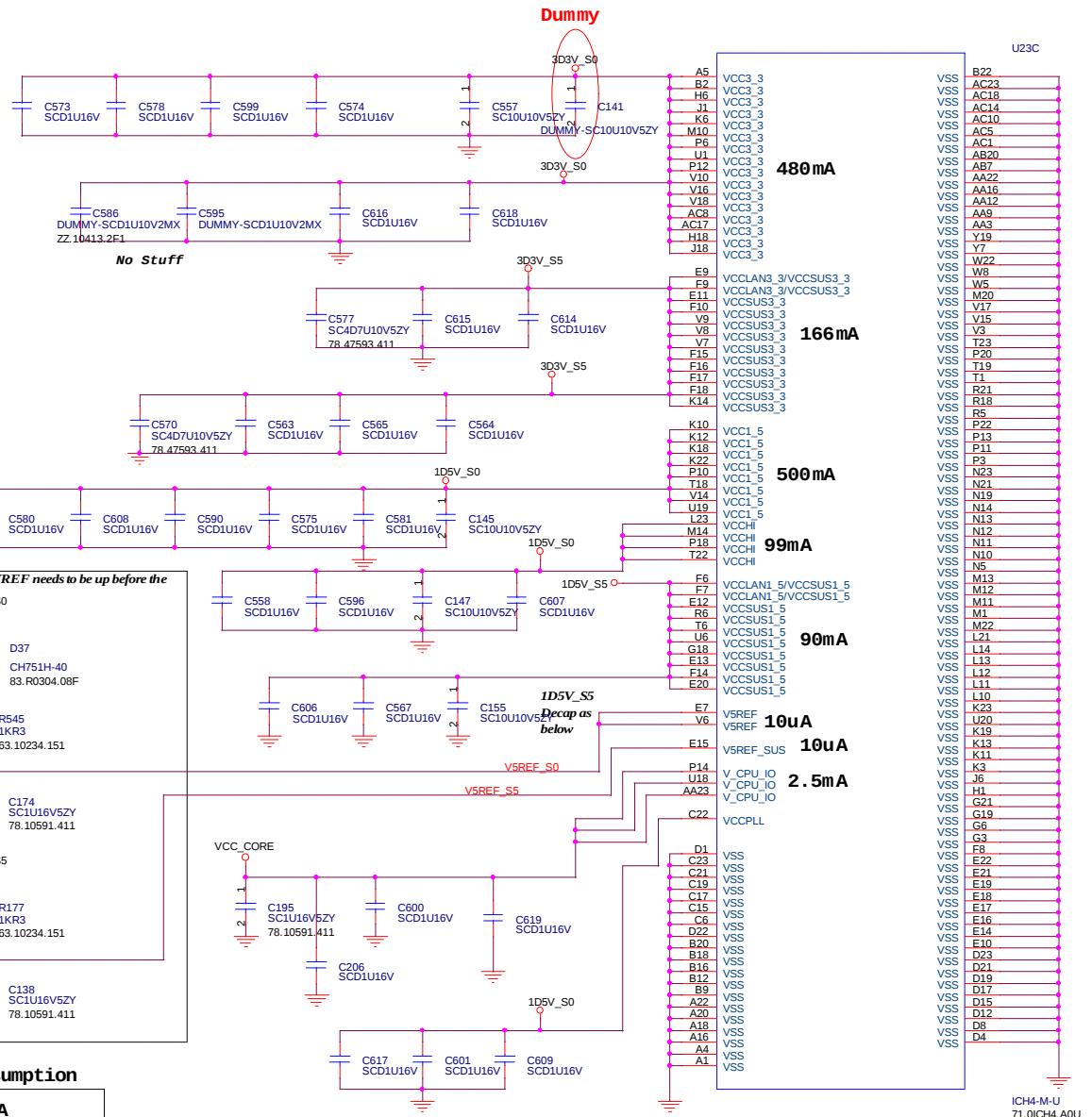






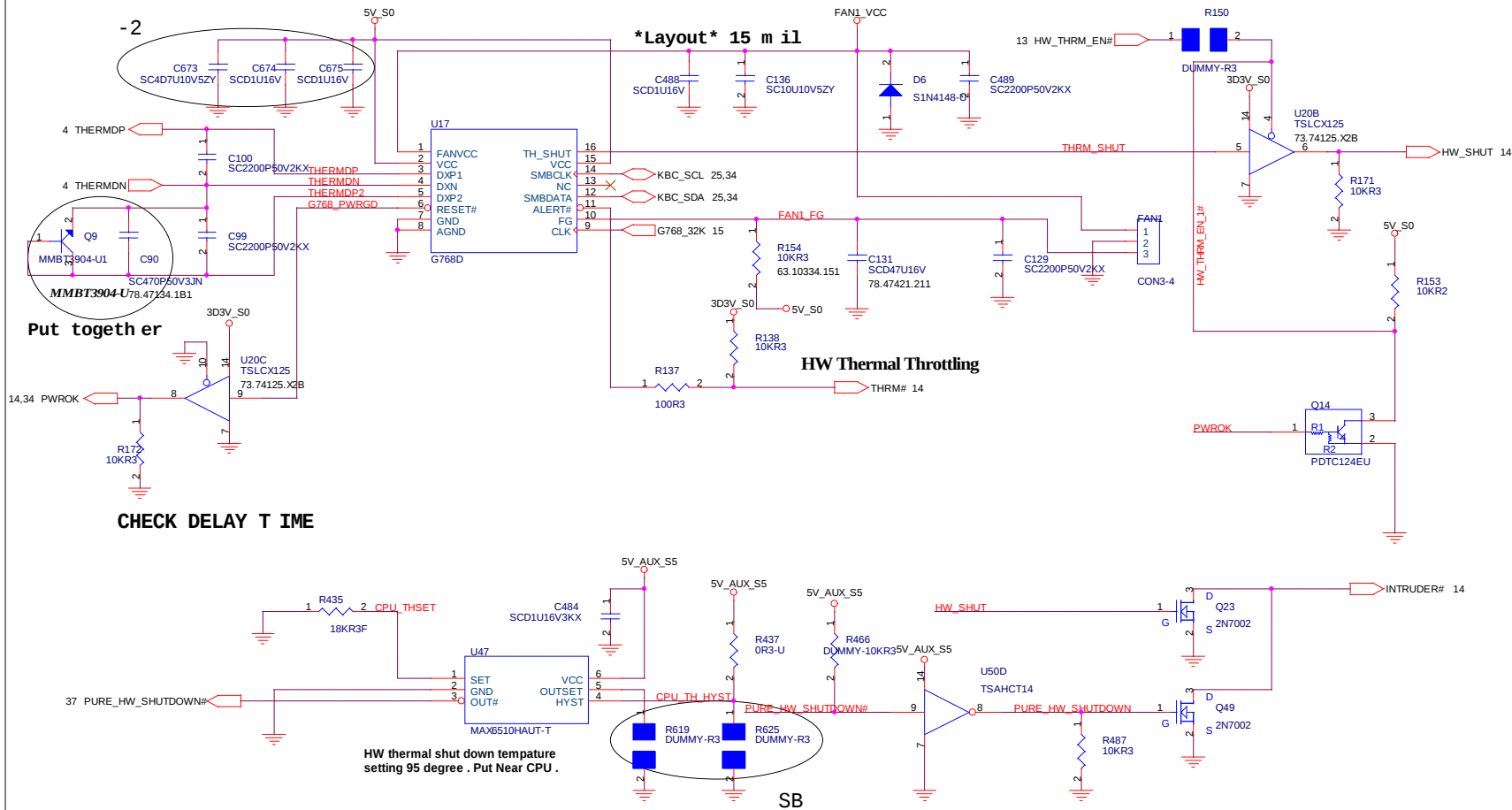
Power Consumption

1D5V_S5 : 90mA
3D3V_S5: 166mA
1D5V_S0: 599mA
3D3V_S0: 480mA
VCC_CORE : 2.5mA

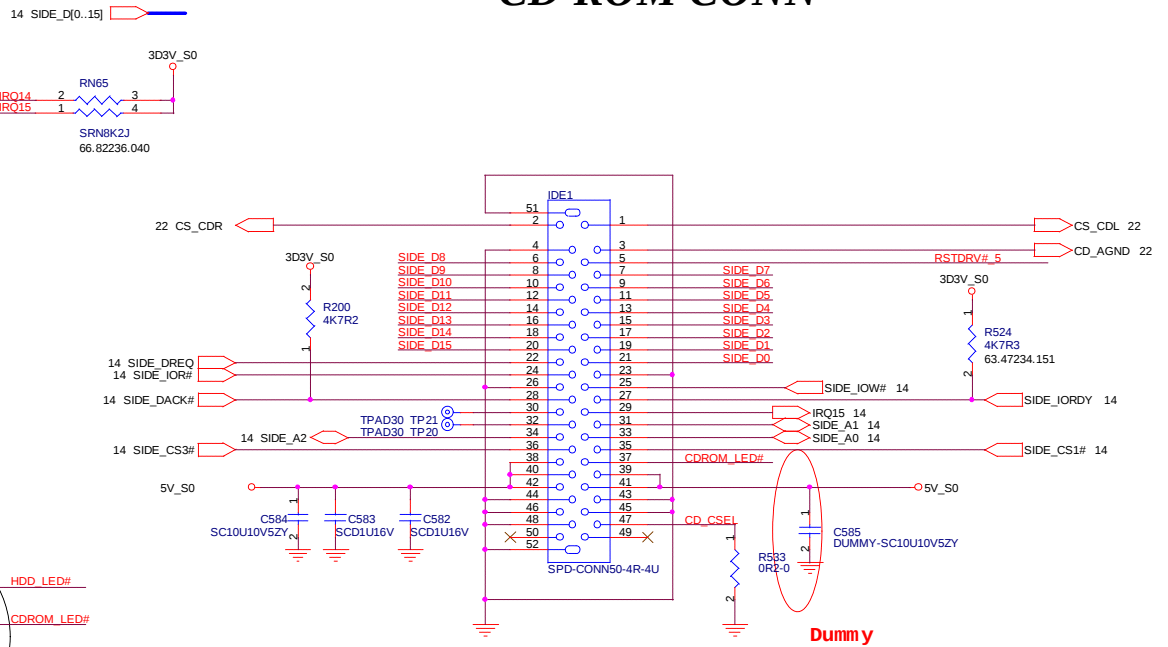


Wistron Corporation 21F, 88, Sec.1, Hsin Tai Wu Rd., Hsichih, Taipei Hsien 221, Taiwan, R.O.C.	
Title: ICH4M(3/3)	
Size: Custom	Document Number: YUHINA
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Rev: SC	

G768D thermal sensor & Fan controller

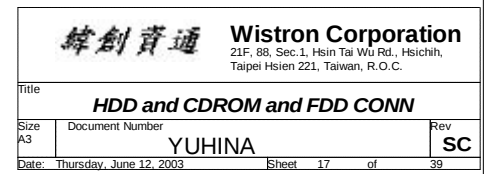


HDD Connector

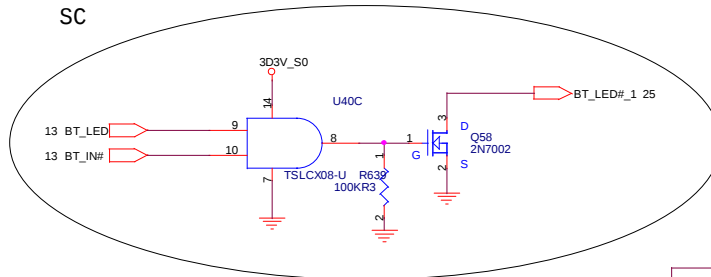
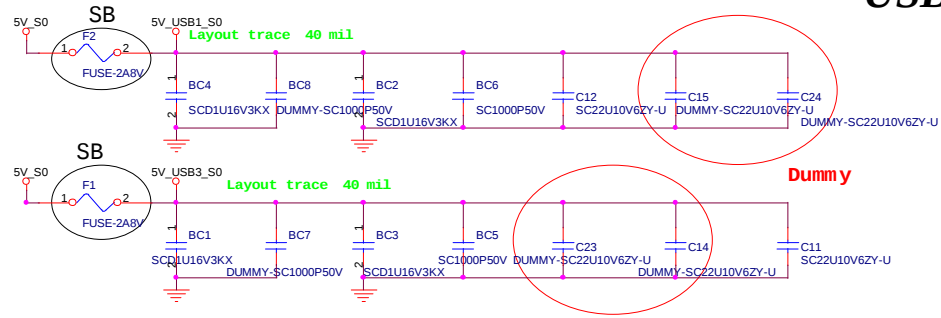


CHECK PIDE/SIDE DIAG# PIN

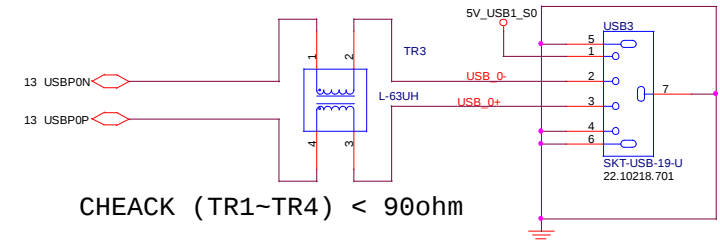
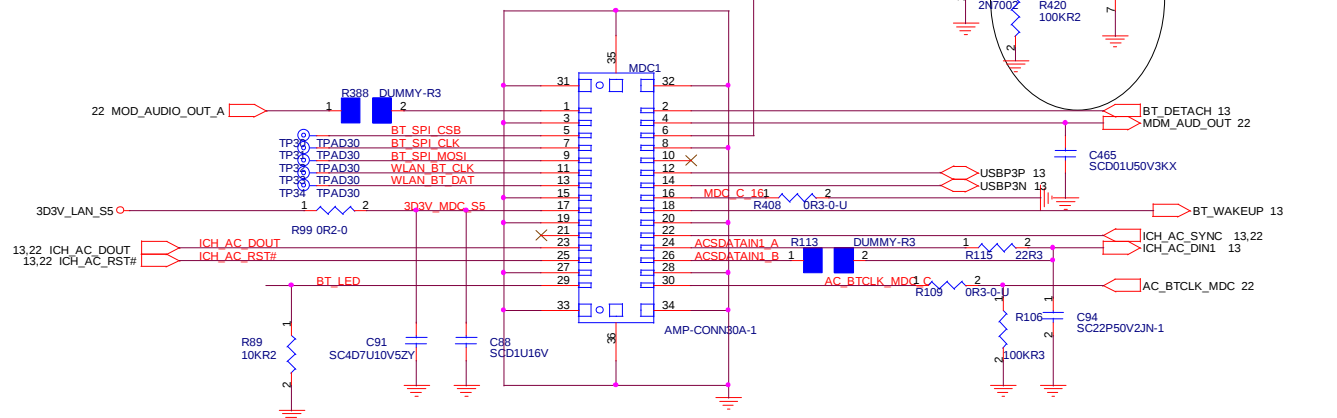
FDD Connector



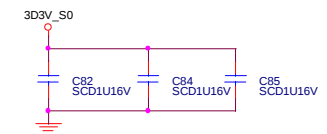
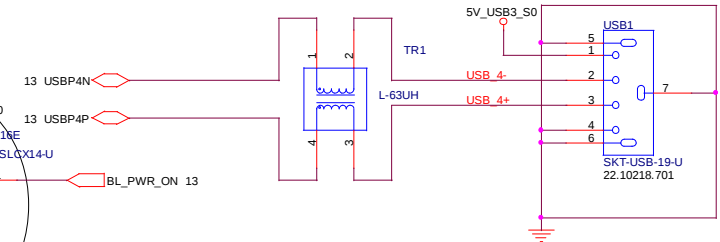
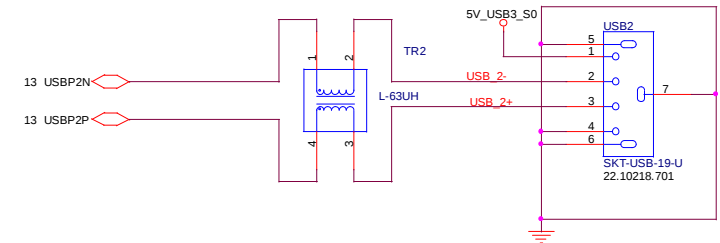
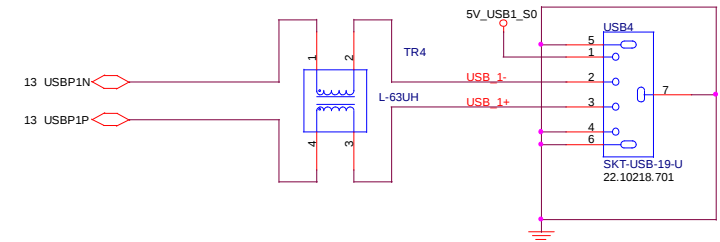
USB PORT



MDC/BT



CHECK (TR1~TR4) < 90ohm



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Taipei Hsien 221, Taiwan, R.O.C.

Title

USB and MDC I/F and LAN

Size

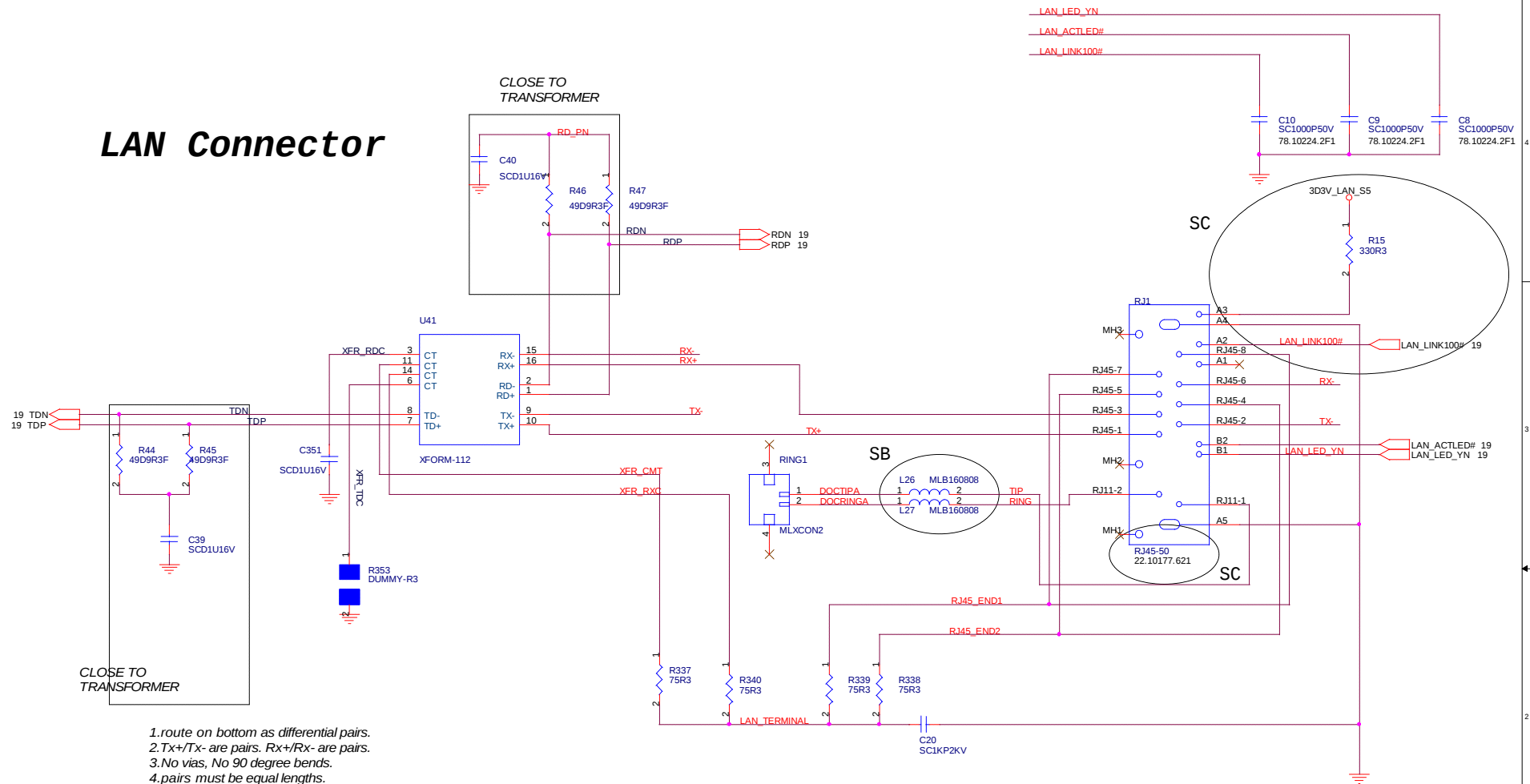
Document Number

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LAN Connector



- 1.route on bottom as differential pairs.
- 2.Tx+/Tx- are pairs. Rx+/Rx- are pairs.
- 3.No vias, No 90 degree bends.
- 4.pairs must be equal lengths.
- 5.6mil trace width,12mil separation.
- 6.36mil between pairs and any other trace.
- 7.Must not cross ground moat,except RJ-45 moat.

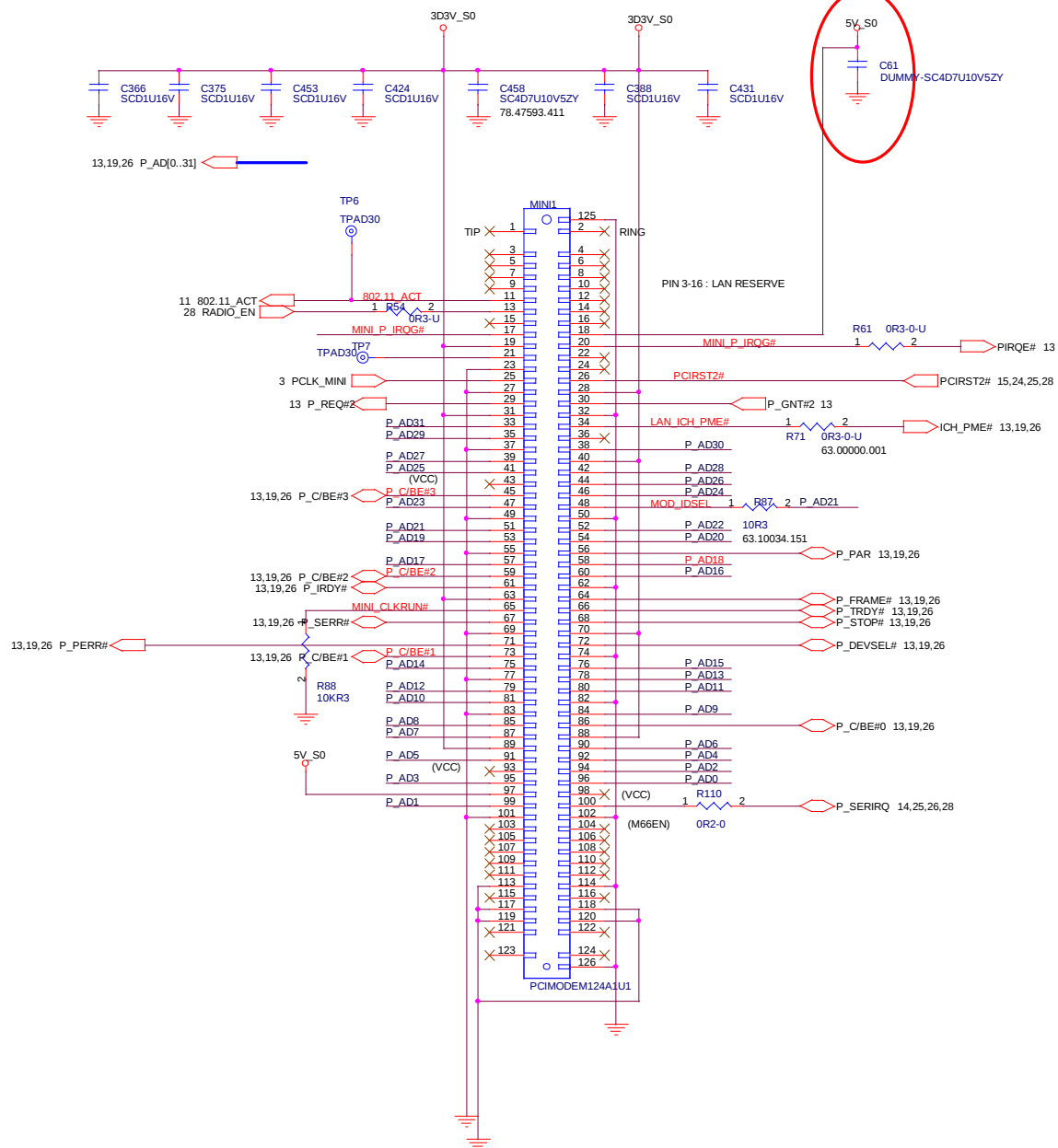
DOC_TIP,DOC_RING,TIP,RING:
W/S : 10/100 @ Surface layers
10/20 @ Inner layers

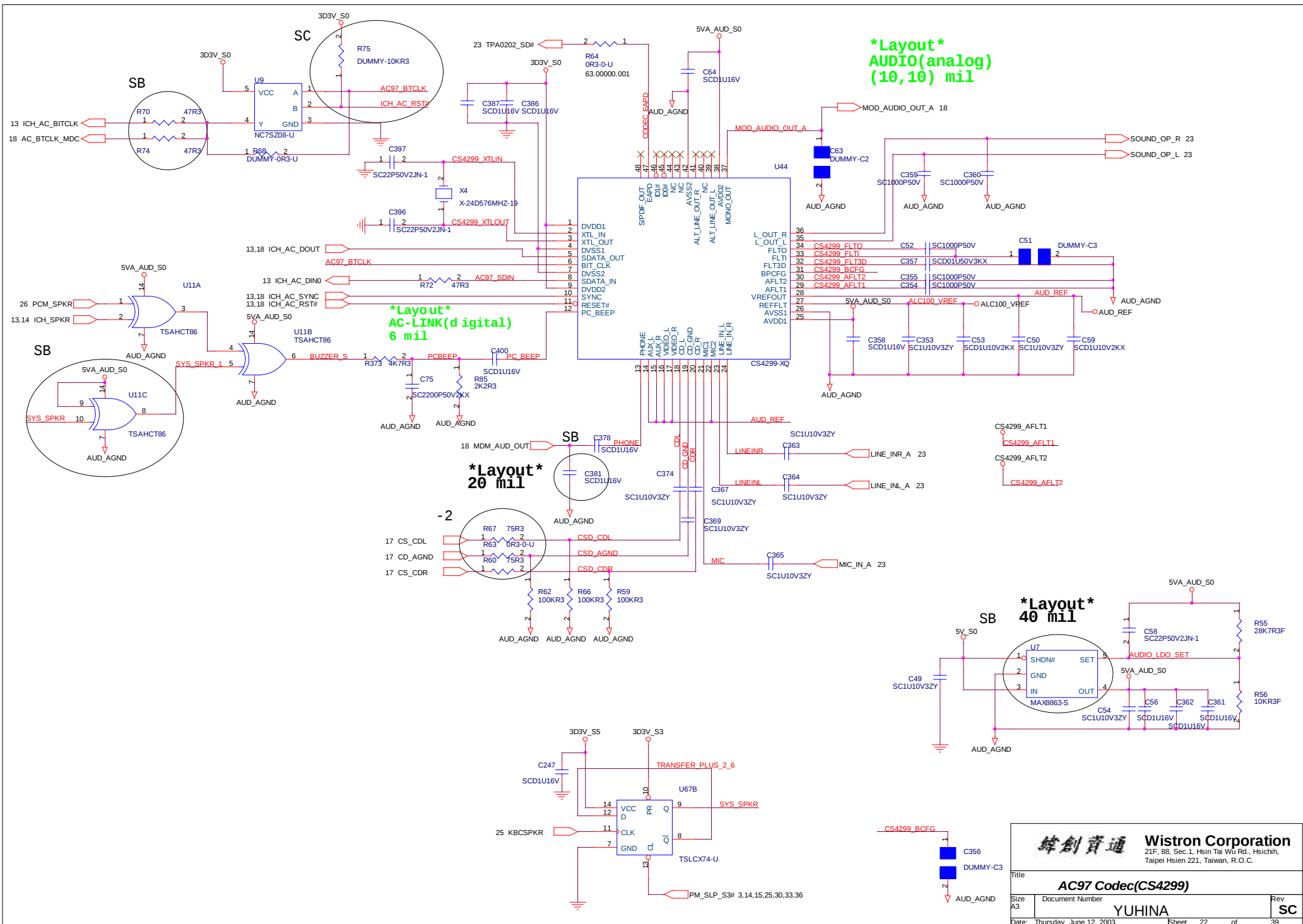
Green LED---Speed100:0 N/Speed10:OFF
Yellow LED---Link:ON ,TX/RX:Flash

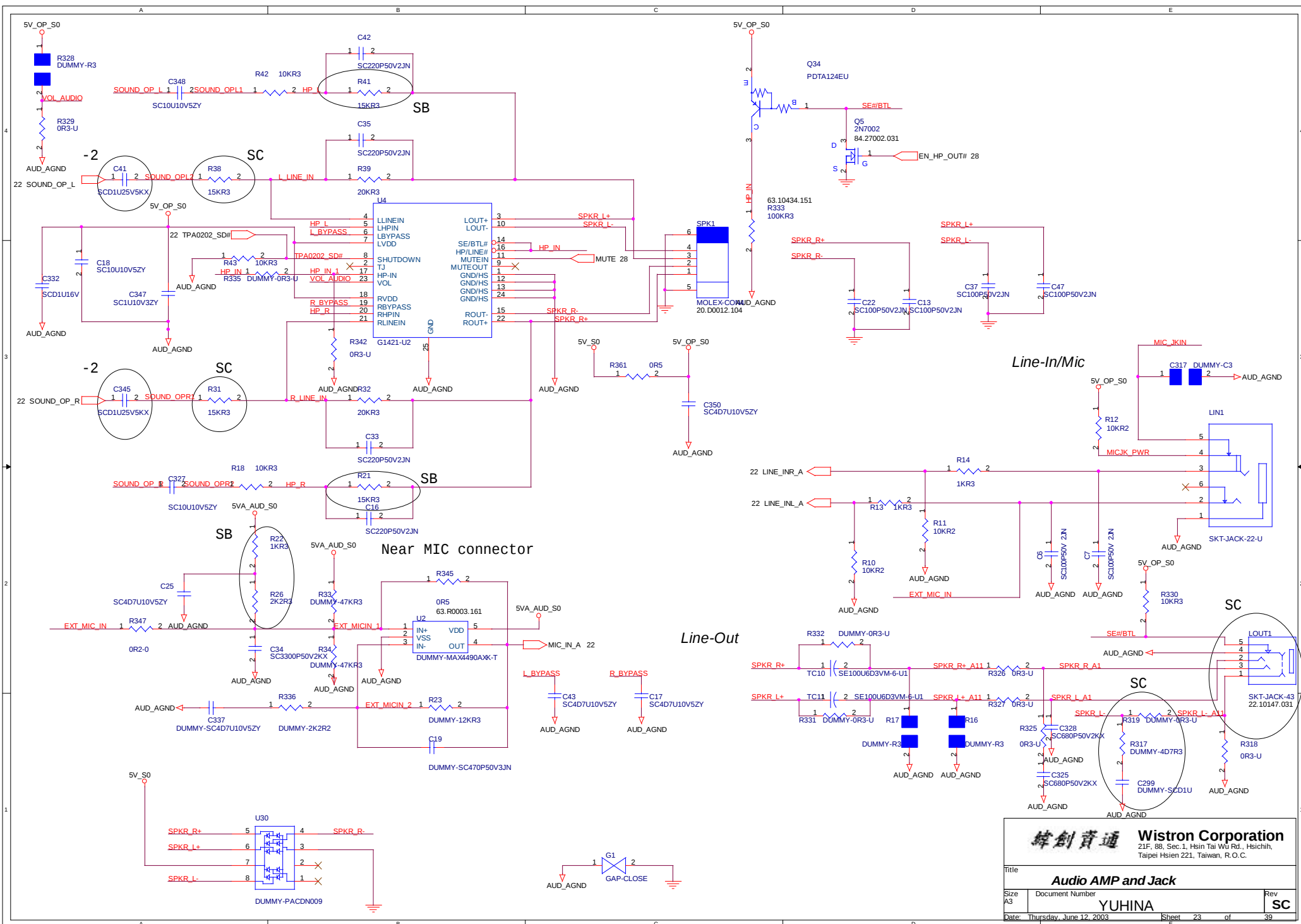
		Wistron Corporation 21F, 88, Sec. 1, Hsin Tai Wu Rd., Hsichih, Taipei Hsien 221, Taiwan, R.O.C.	
Title			
LAN Connector			
Size A3	Document Number		Rev
	YUHINA		SC
Date:	Thursday, June 12, 2003	Sheet 20 of	39

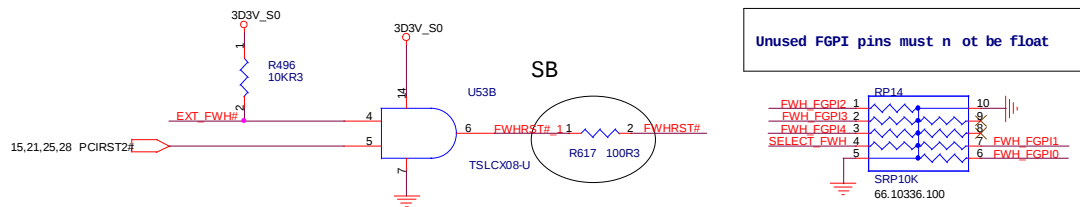
Mini PCI

Dummy

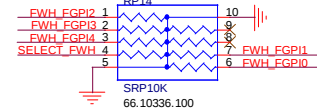




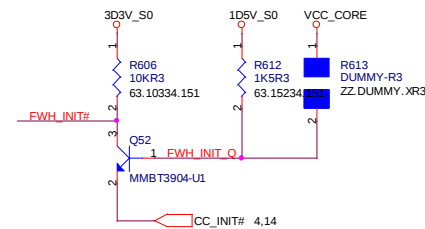




Unused FGPI pins must not be float



CHANGE VCORE

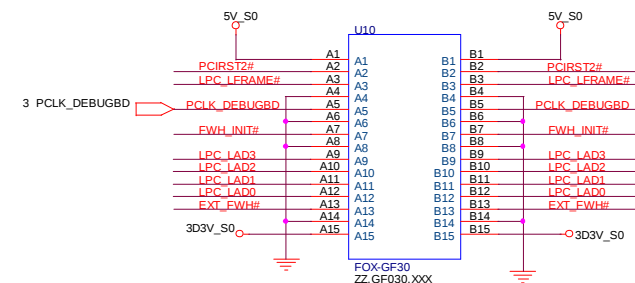


TOP VIEW

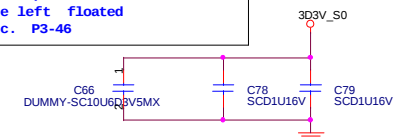
A15 (B1)
A14 (B2)
:
:
A2 (B14)
A1 (B15)

(BOTTOM VIEW)

GOLDEN FINGER FOR DEBUG BOARD

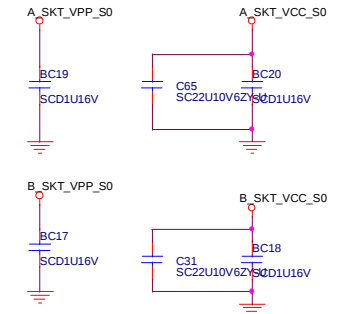
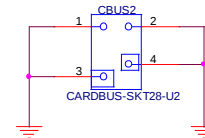
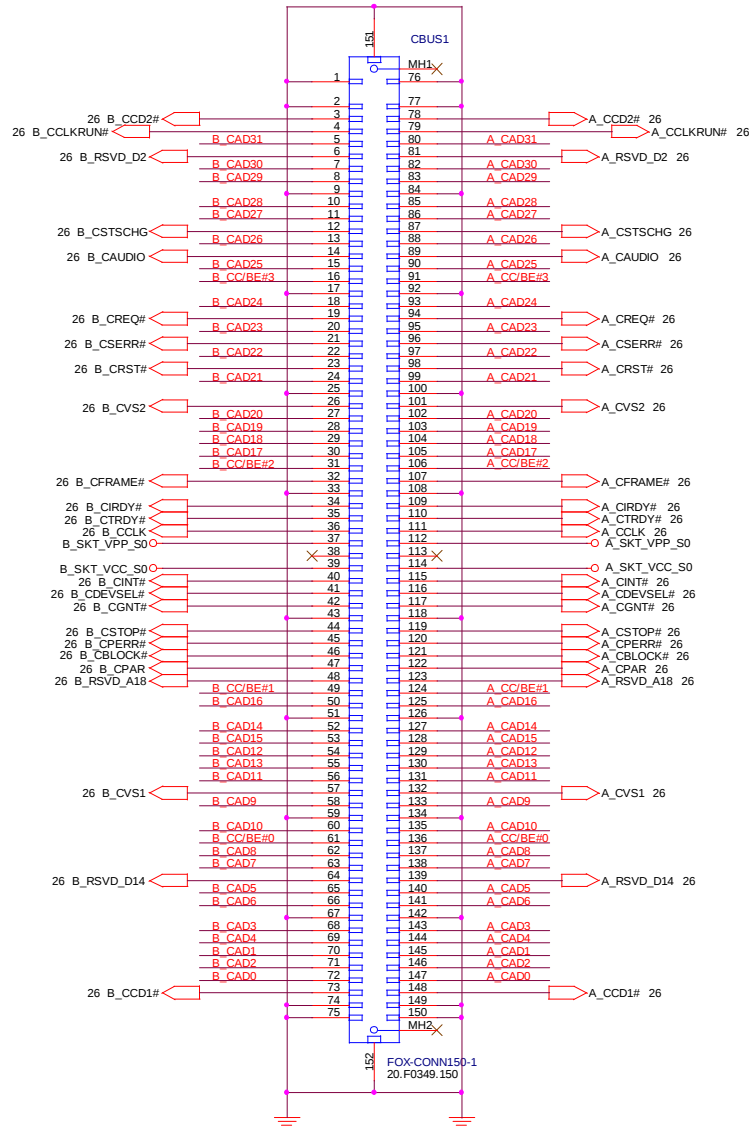
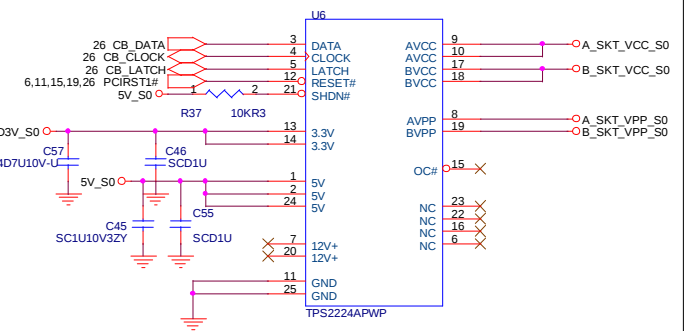
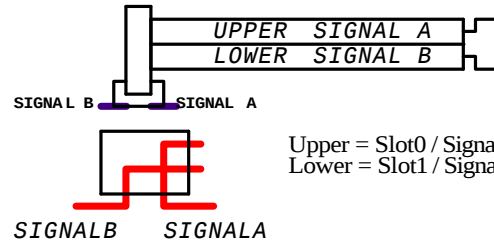
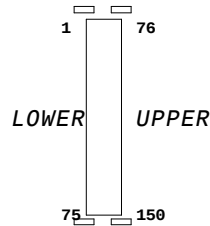


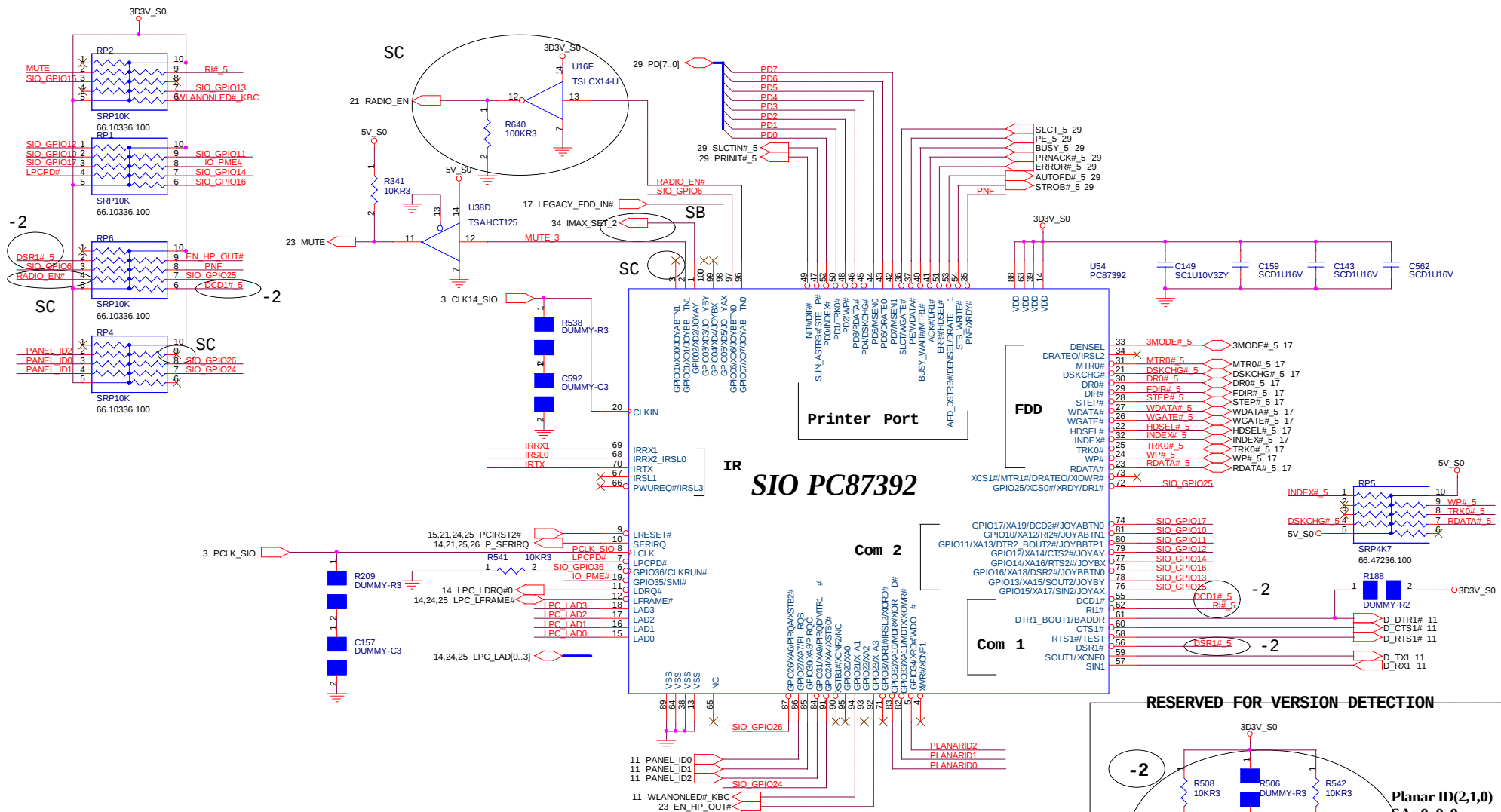
Boot Device must have ID [3:0] = 0000
Has internal pull-down resistors
All may be left floated
FPET7 Elec. P3-46



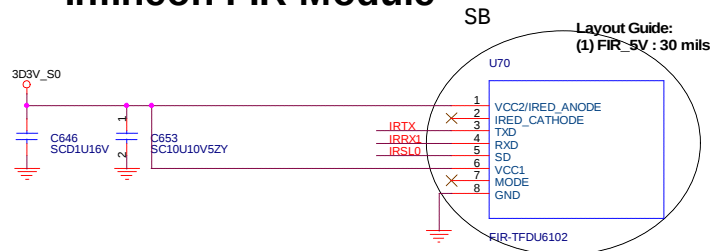
SECOND SOURCE
72.50040.003 ST
72.49004.C03 PMC

A_CC/BE#[3..0] 26
 B_CC/BE#[3..0] 26
 A_CAD[31..0] 26
 B_CAD[31..0] 26



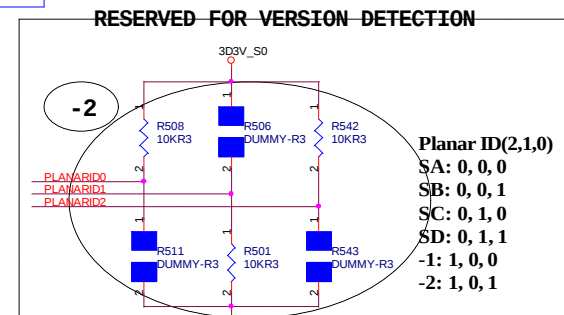


Infinion FIR Module

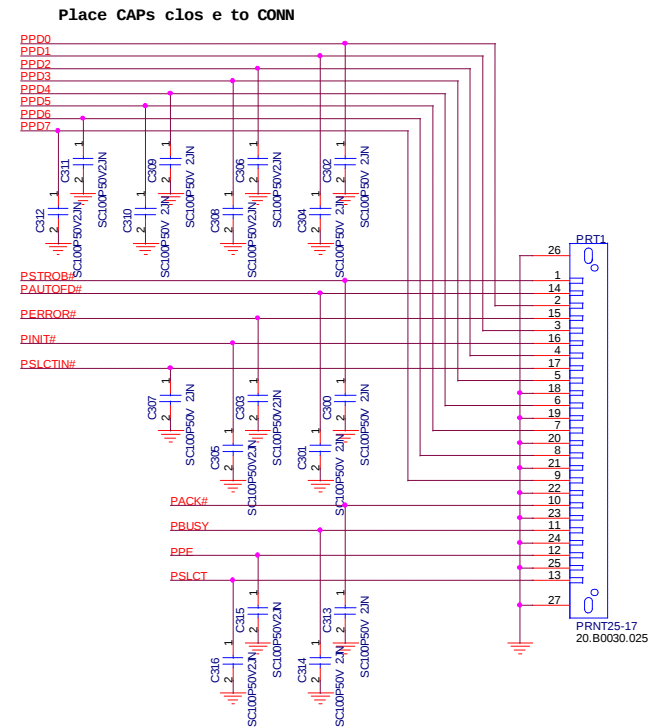
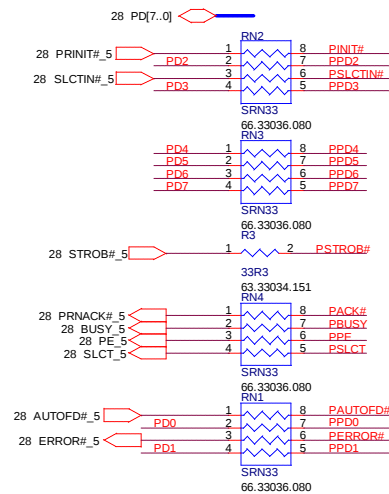
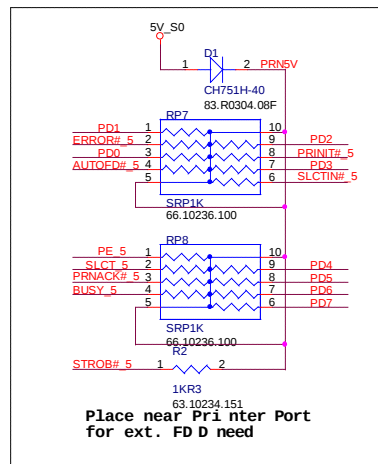


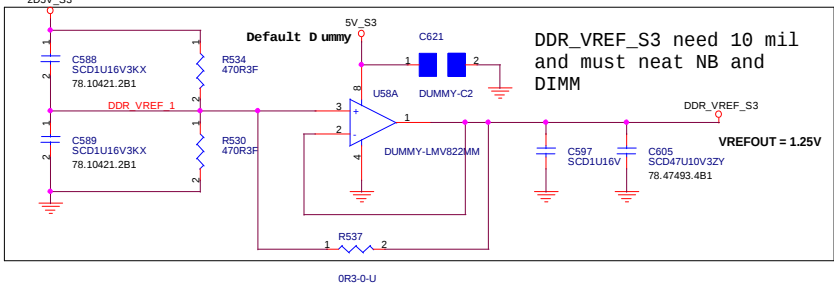
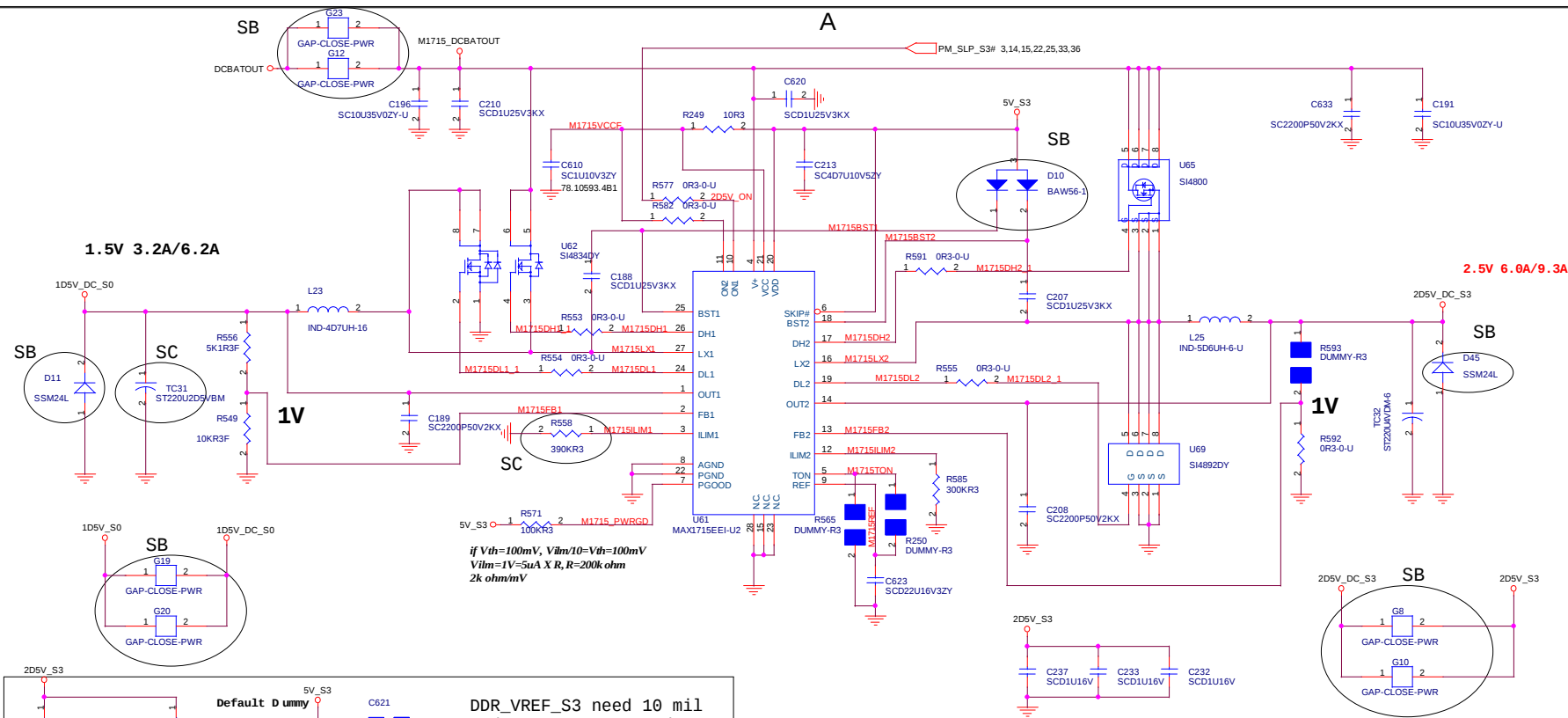
PANEL ID DEFINE			
PANEL_ID2	PANEL_ID1	PANEL_ID0	VENDORS
1	1	1	No Panel
0	1	1	Hitachi (15")
0	1	1	AU (15")
0	1	1	CMO(15")
1	0	0	CMO(14")
1	0	1	AU (14")
1	1	0	AU (14")**

Note : AU (□ 1),CMO(© -),** : With Digitizer

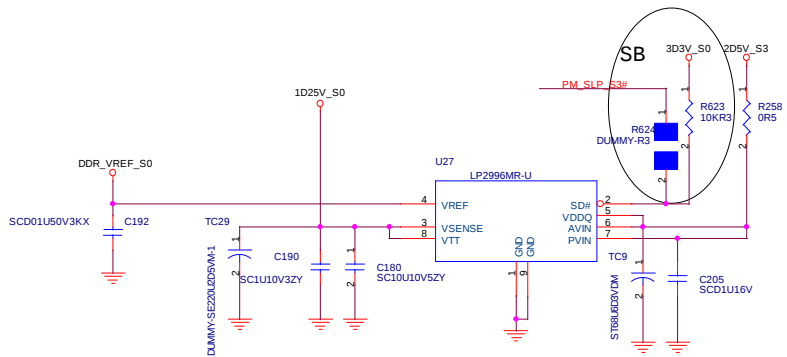


PRINTER PORT

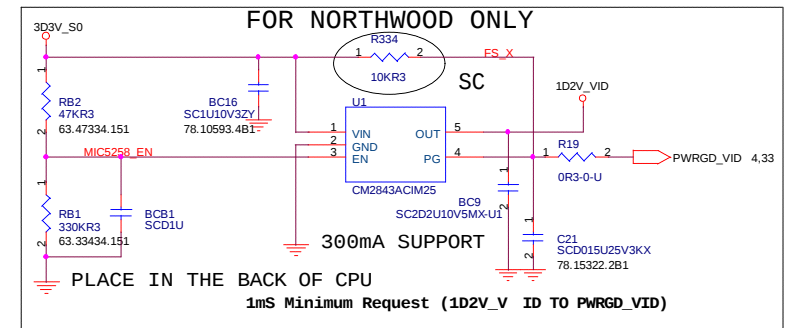
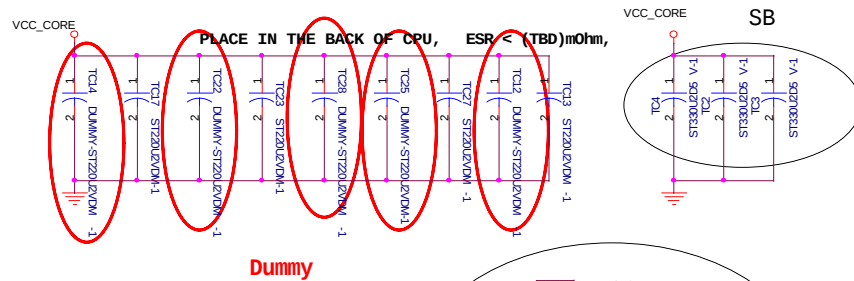




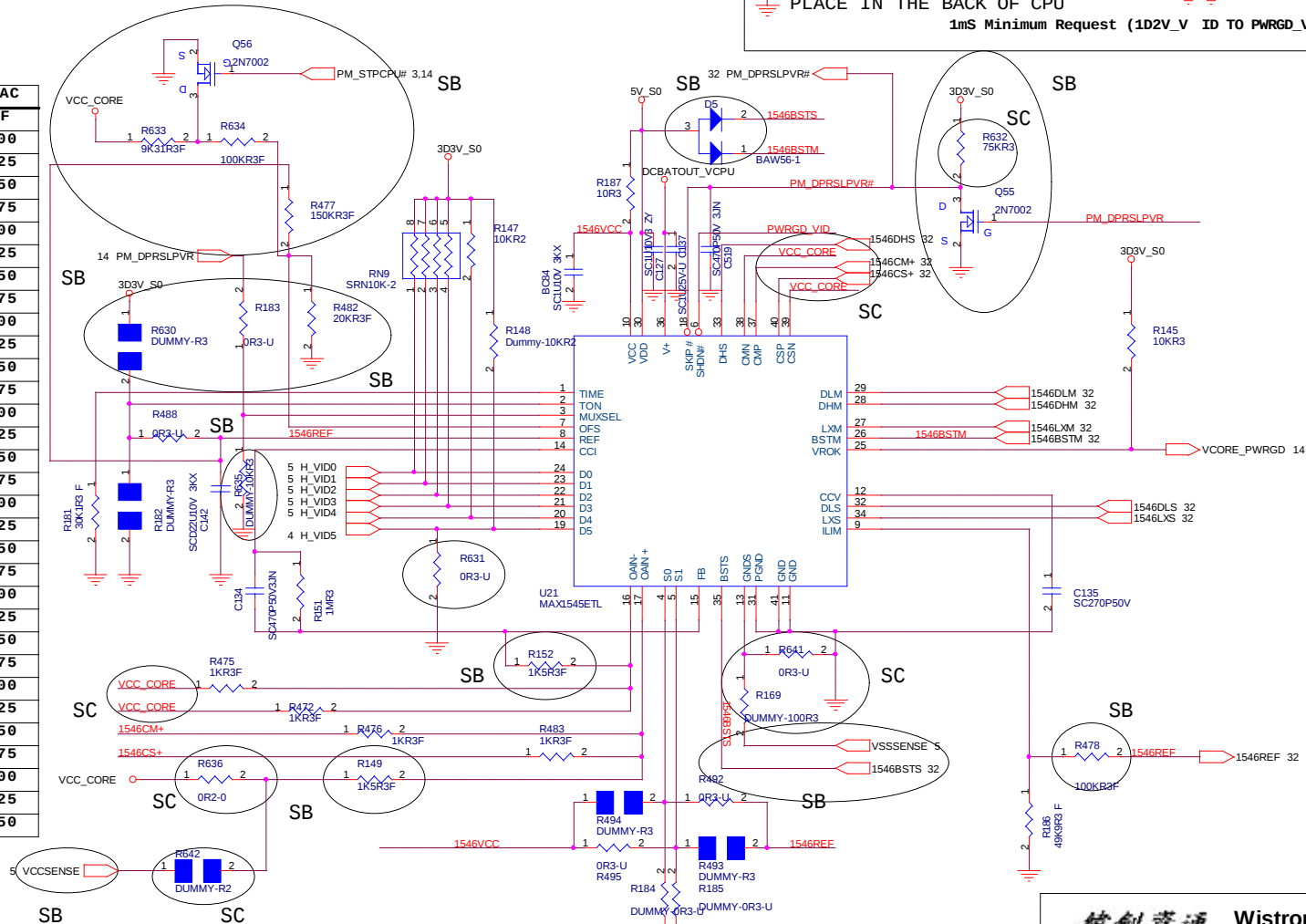
DDR_VREF MUST NEAR NB/DIMM



CPU_Vcore IMVP5_FMS0(1/2)



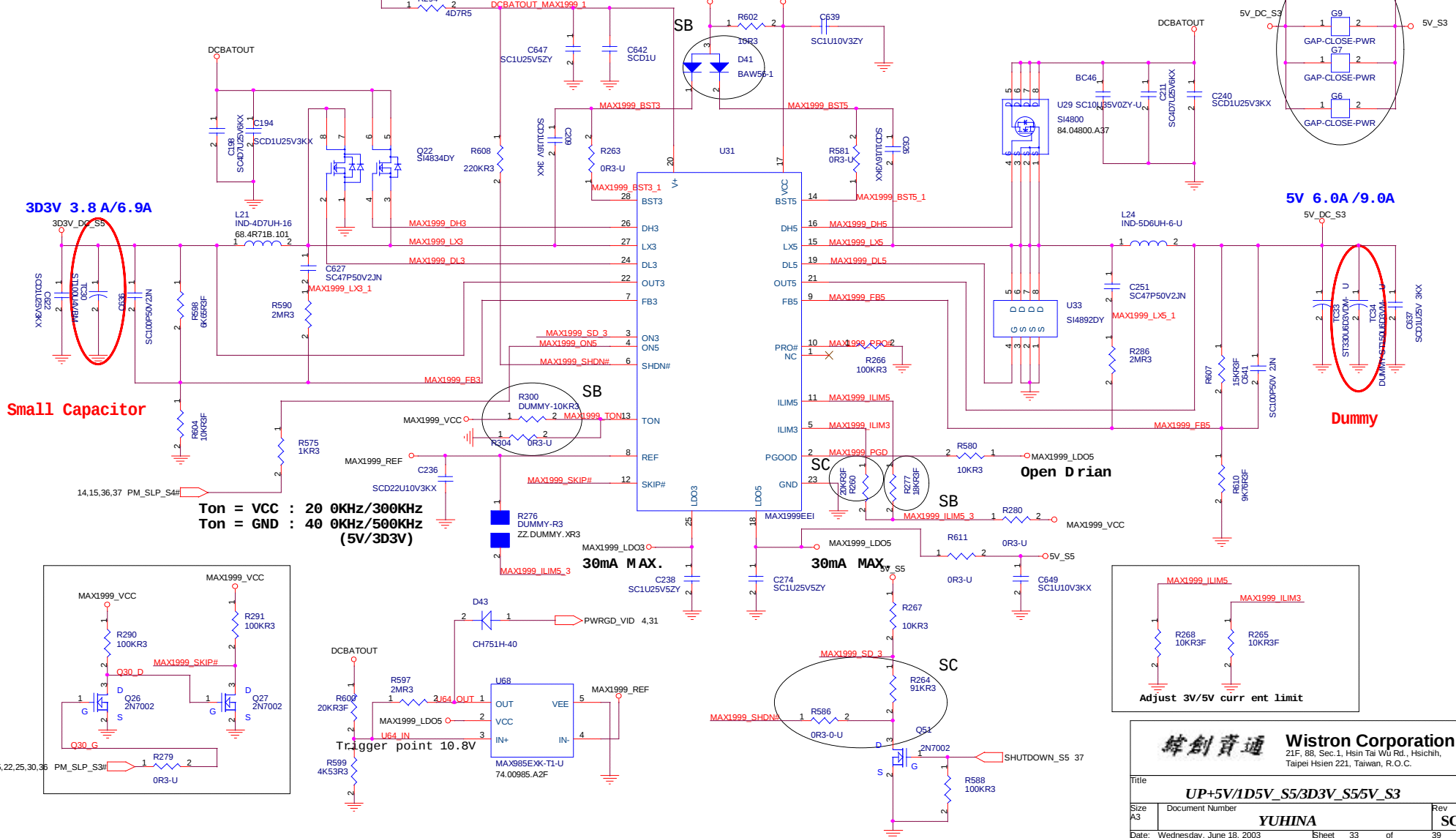
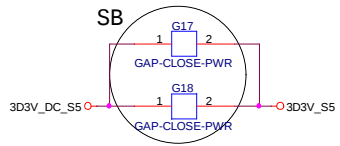
Voltage Identification Codes						
VID5	VID4	VID3	VID2	VID1	VID0	VDAC
	1	1	1	1	1	OFF
	1	1	1	1	0	1.100
	1	1	1	0	1	1.125
	1	1	1	0	0	1.150
	1	1	0	1	1	1.175
	1	1	0	1	0	1.200
	1	1	0	0	1	1.225
	1	1	0	0	0	1.250
	1	0	1	1	1	1.275
	1	0	1	1	0	1.300
	1	0	1	0	1	1.325
	1	0	1	0	0	1.350
	1	0	0	1	1	1.375
	1	0	0	1	0	1.400
	1	0	0	0	1	1.425
	1	0	0	0	0	1.450
	0	1	1	1	1	1.475
	0	1	1	1	0	1.500
	0	1	1	0	1	1.525
	0	1	1	0	0	1.550
	0	1	0	1	1	1.575
	0	1	0	1	0	1.600
	0	1	0	0	1	1.625
	0	1	0	0	0	1.650
	0	0	1	1	1	1.675
	0	0	1	1	0	1.700
	0	0	1	0	1	1.725
	0	0	1	0	0	1.750
	0	0	0	1	1	1.775
	0	0	0	1	0	1.800
	0	0	0	0	1	1.825
	0	0	0	0	0	1.850



1



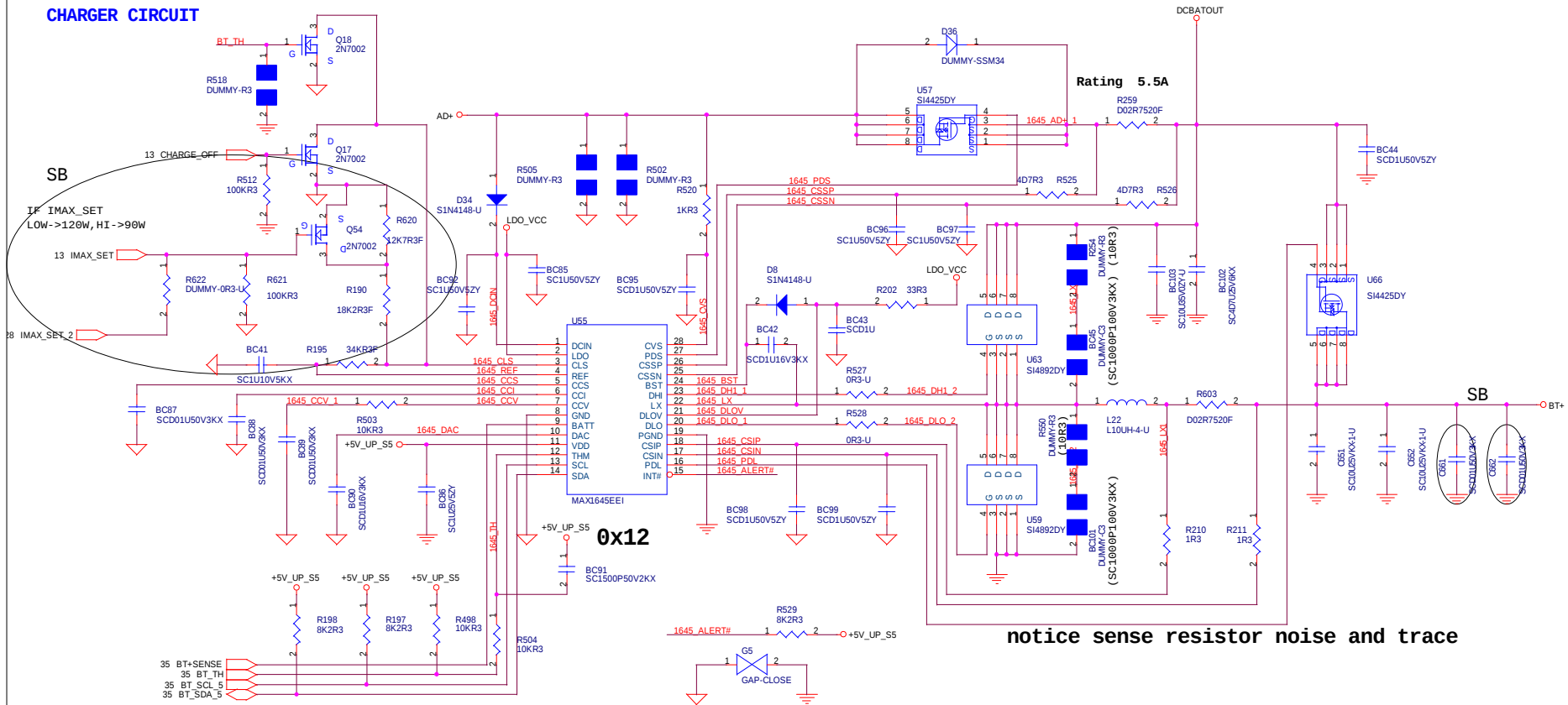
SYSTEM DC/DC
3D3V_S5/5V_S5



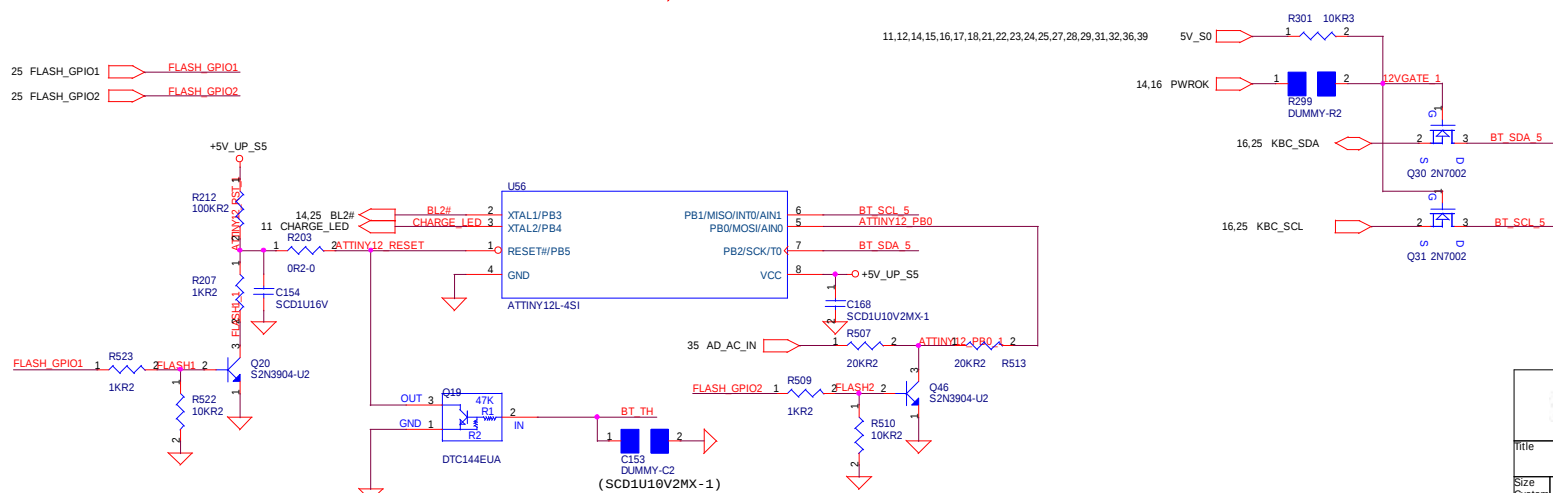
緯創資通 **Wistron Corporation**
21F, 88, Sec.1, Hsin Tai Wu Rd., Hsichih,
Taipei Hsien 221, Taiwan, R.O.C.

Title			
UP+5V_1D5V_S5/3D3V_S5/5V_S3			
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CHARGER CIRCUIT

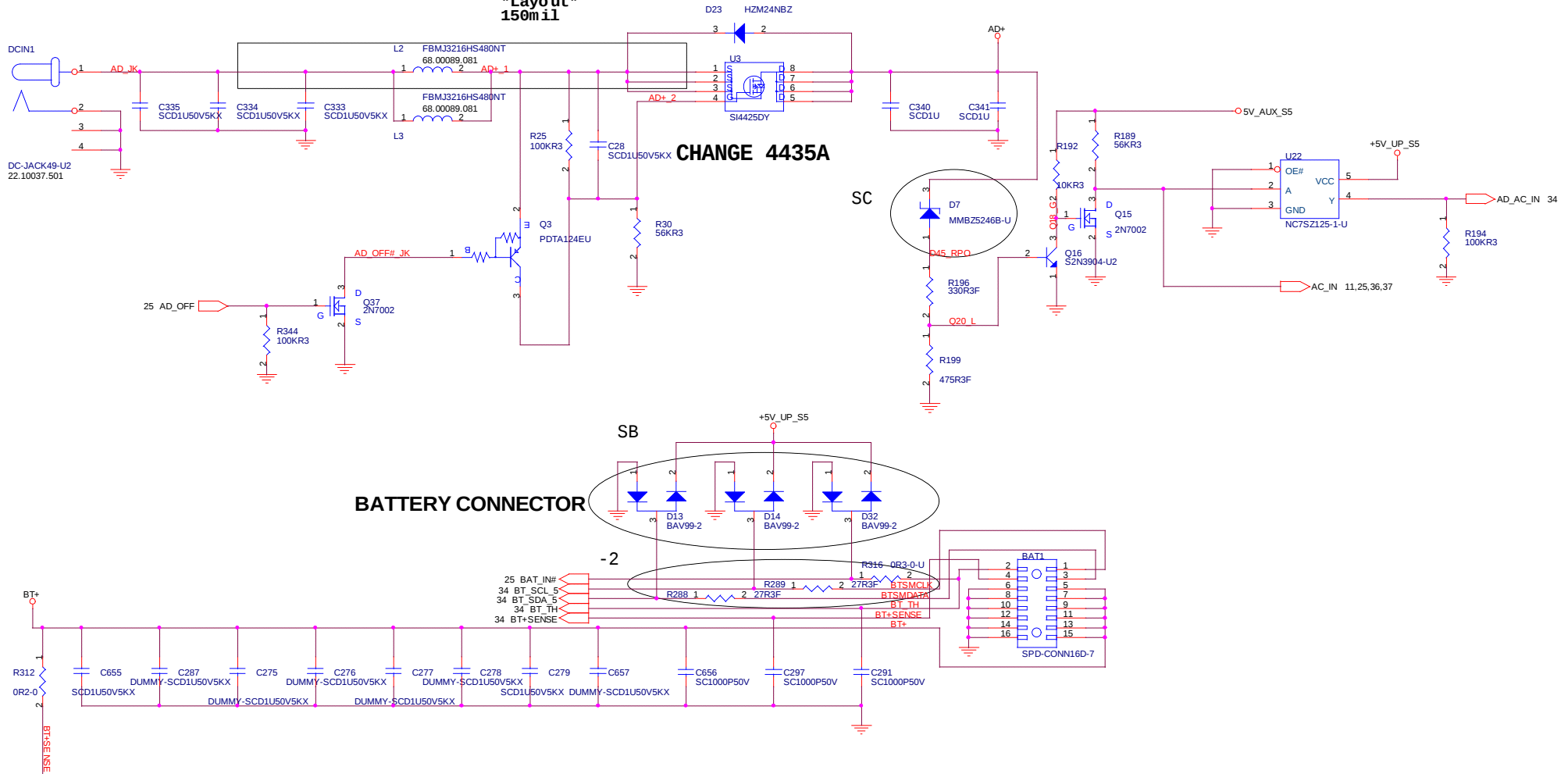


notice sense resistor noise and trace



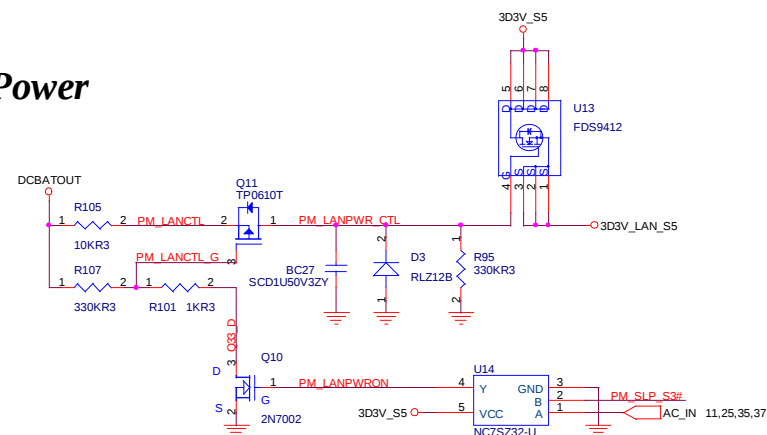
Adaptor in to generate DCBATOUT

Layout
150m11

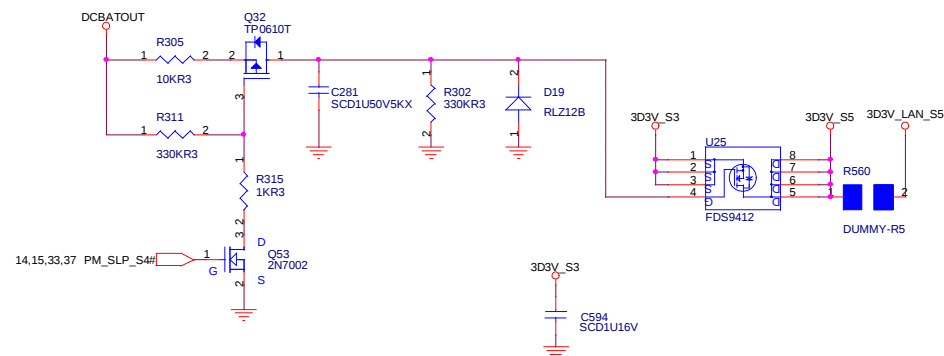


緯創資通 Wistron Corporation
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Taipei Hsien 221, Taiwan, R.O.C.

Title		
AD/BATT CONN		
Size	Document Number	Rev
A3	YUHINA	SC
Date: Thursday, June 12, 2003		
Sheet 35 of 39		

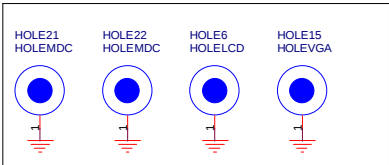
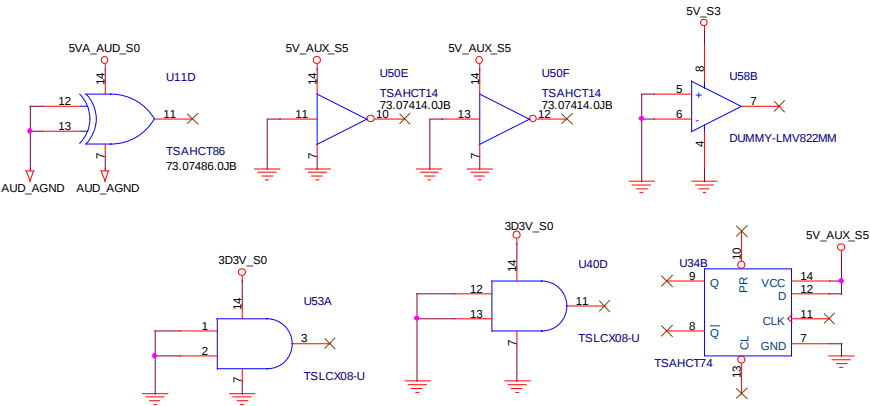
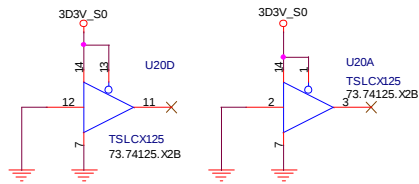
[illegible]

Support standby wakeup LAN only

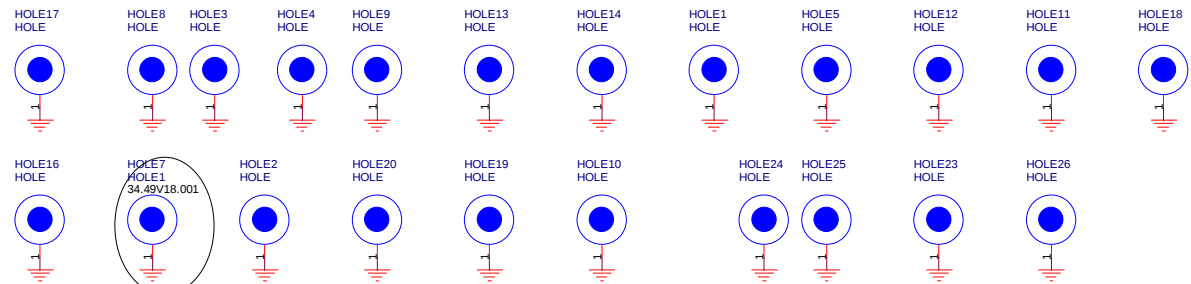




NO USE LOGIC

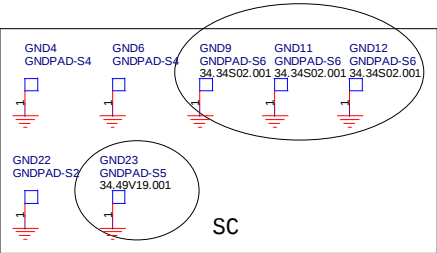


SPARE GATES

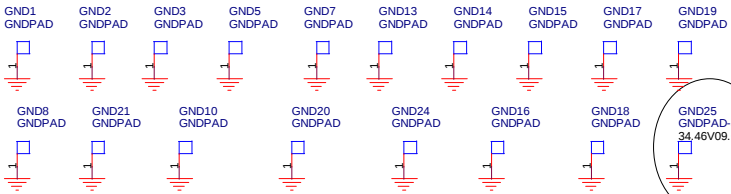


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