

	1	2	3	4	5	6	7	8																																																																																				
A	THIS DRAWING AND SPECIFICATIONS, HEREIN, ARE THE PROPERTY OF INVENTEC CORPORATION AND SHALL NOT BE REPRODUCED, COPIED, OR USED IN WHOLE OR IN PART AS THE BASIS FOR THE MANUFACTURE OR SALE OF ITEMS WITHOUT WRITTEN PERMISSION, INVENTEC CORPORATION 2009 ALL RIGHT RESERVED								A																																																																																			
B									B																																																																																			
C									C																																																																																			
D									D																																																																																			
E									E																																																																																			
F	<table border="1"><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td></td><td></td><td></td></tr><tr><td>DATE</td><td>CHANGE NO.</td><td>REV</td></tr></table>																										DATE	CHANGE NO.	REV			<table border="1"><tr><td></td><td>EE</td><td>DATE</td><td>POWER</td><td>DATE</td></tr><tr><td>DRAWER</td><td></td><td></td><td></td><td></td></tr><tr><td>DESIGN</td><td></td><td></td><td></td><td></td></tr><tr><td>CHECK</td><td></td><td></td><td></td><td></td></tr><tr><td>RESPONSIBLE</td><td></td><td></td><td></td><td></td></tr><tr><td colspan="2">SIZE = 3</td><td colspan="3">VER :</td></tr><tr><td colspan="5">FILE NAME : XXXX-XXXXXX-XX</td></tr><tr><td>P/N</td><td colspan="4">XXXXXXXXXXXX</td></tr></table>			EE	DATE	POWER	DATE	DRAWER					DESIGN					CHECK					RESPONSIBLE					SIZE = 3		VER :			FILE NAME : XXXX-XXXXXX-XX					P/N	XXXXXXXXXXXX				<table border="1"><tr><td colspan="4">INVENTEC</td></tr><tr><td colspan="4">TITLE Hublot-Discrete</td></tr><tr><td>SIZE A3</td><td>CODE CS</td><td>DOC. NUMBER 1310A22593-0-MTR</td><td>REV A01</td></tr><tr><td colspan="2">SHEET 1</td><td colspan="2">OF 60</td></tr></table>		INVENTEC				TITLE Hublot-Discrete				SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MTR	REV A01	SHEET 1		OF 60		F
DATE	CHANGE NO.	REV																																																																																										
	EE	DATE	POWER	DATE																																																																																								
DRAWER																																																																																												
DESIGN																																																																																												
CHECK																																																																																												
RESPONSIBLE																																																																																												
SIZE = 3		VER :																																																																																										
FILE NAME : XXXX-XXXXXX-XX																																																																																												
P/N	XXXXXXXXXXXX																																																																																											
INVENTEC																																																																																												
TITLE Hublot-Discrete																																																																																												
SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MTR	REV A01																																																																																									
SHEET 1		OF 60																																																																																										
	1	2	3	4	5	6	7	8																																																																																				

Table Of Contents

Page

- 5- DC & Battery Charger.
- 6- Select & Battery connector.
- 7- System Power (+V3A/+V5A).
- 8- System Power (+V1.5/+VCCP).
- 9- Graphic Power (+VDD_CORE & +VPCIE).
- 10- VRAM Power (+V1.8S).
- 11- CPU Power (+VCC_CORE).
- 12- DDR Termination Voltage(+V0.75S).
- 13- Power (Sleep: +V5S/+V3S/+V1.5S).
- 14- Power (Sequence).

Page

- 15- Clock Generator.
- 16- CPU Penryn-1.
- 17- CPU Penryn-2.
- 18- CPU Penryn-3.
- 19- Thermal & Fan.
- 20- N/B Cantiga-1.
- 21- N/B Cantiga-2.
- 22- N/B Cantiga-3.
- 23- N/B Cantiga-4.
- 24- N/B Cantiga-5.
- 25- N/B Cantiga-6.
- 26- DDR3-DIMM0.
- 27- DDR3-DIMM1.
- 28- DDR3-DAMPING.
- 29- CRT CONN.
- 30- HDMI CONN.
- 31- LCM CONN.
- 32- S/B ICH9-1.
- 33- S/B ICH9-2.
- 34- S/B ICH9-3.
- 35- S/B ICH9-4.
- 36- S/B ICH9-5.

Page

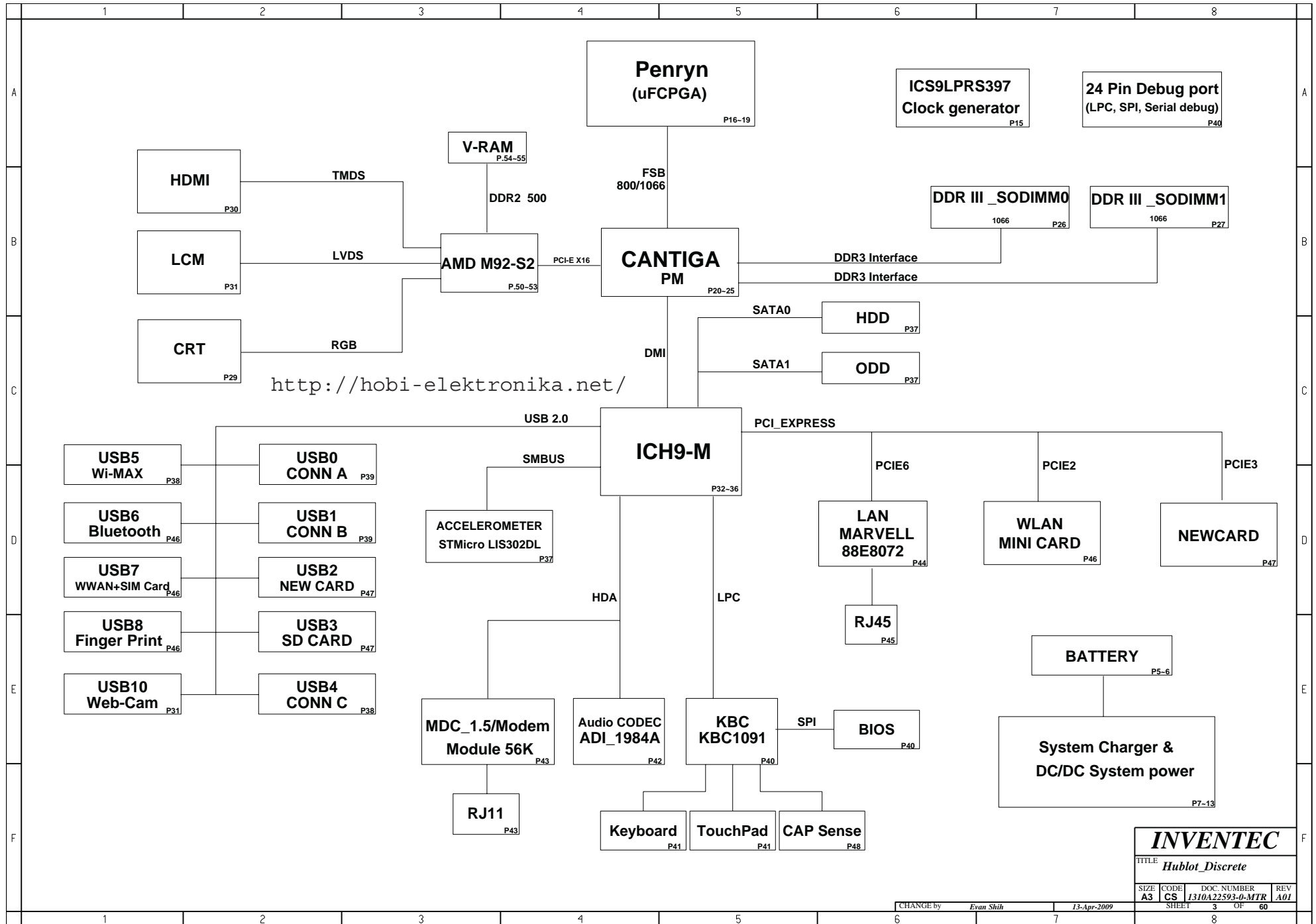
- 37- HDD & ODD CONN & Accelerometer.
- 38- USB & Finger print CONN.
- 39- USB_Daughter Board.
- 40- KBC & BIOS ROM.
- 41- Internal Keyboard & TouchPad CONN.
- 42- Audio CODEC & Earphone & Speaker.
- 43- Audio MIC & MDC CONN.
- 44- Giga LAN controller.
- 45- Magnetic & RJ45 CONN.
- 46- Mini Card & BT CONN.
- 47- New Card & 2 in 1 Card (SD/MMC).
- 48- LEDs & Buttons & SW/B CONN.
- 49- Screws & FixMask.
- 50- AMD M92_S2-1.
- 51- AMD M92_S2-2.
- 52- AMD M92_S2-3.
- 53- AMD M92_S2-4.
- 54- Video RAM-1 (DDR2).
- 55- Video RAM-2 (DDR2).
- 56- CAP Sense board.
- 57- HDD Extend board.
- 58- Finger Print board.
- 59- USB Extend board.
- 60- Power Switch & SIM Card board.

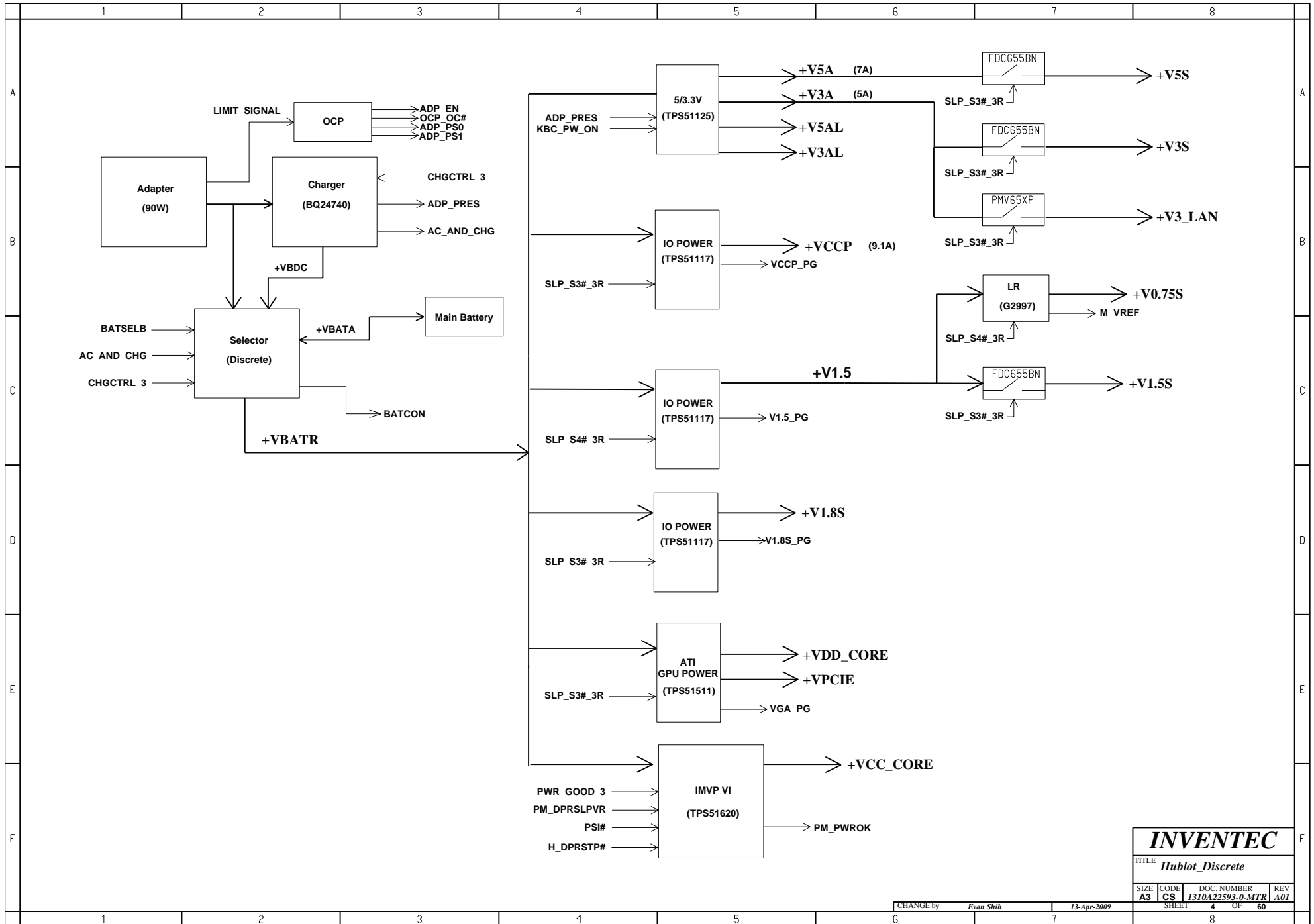
INVENTEC

TITLE
Hublot_Discrete

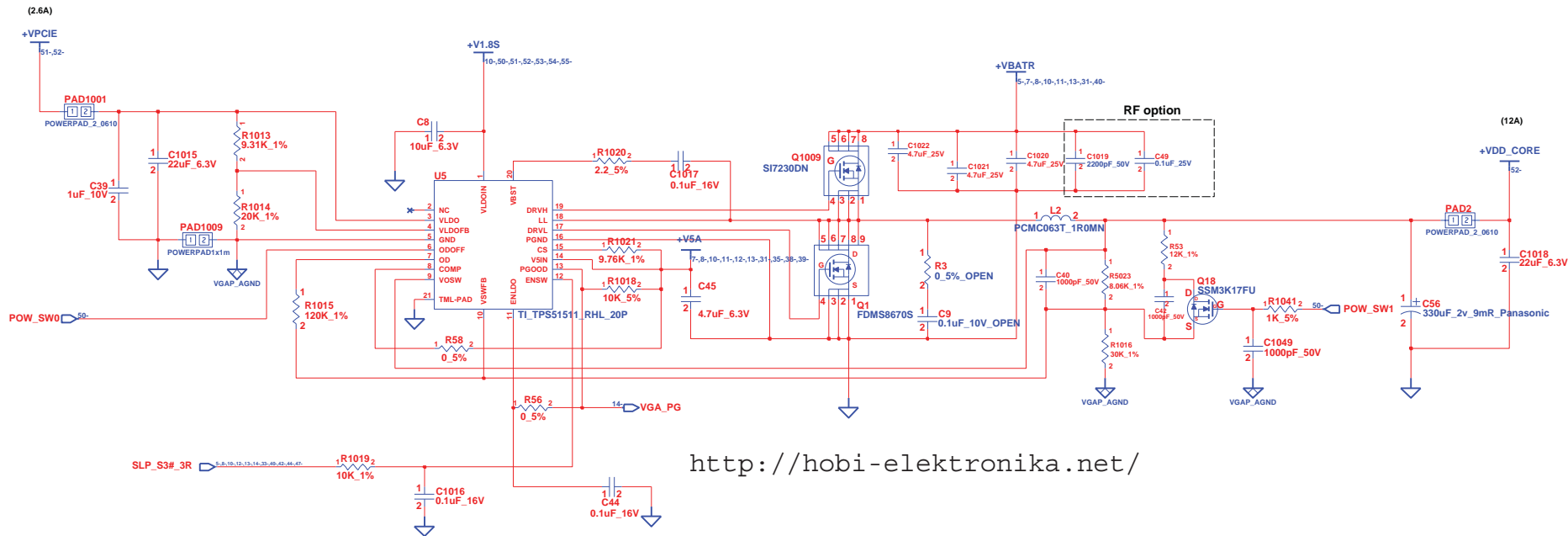
SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MTR	REV A01
SHEET 2		OF 60	

CHANGE by *Evan Shih* 15-Apr-2009





POW_SW1	POW_SW0	+VDD_CORE
0	0	1.05V
0	1	1.0V
1	0	0.95V



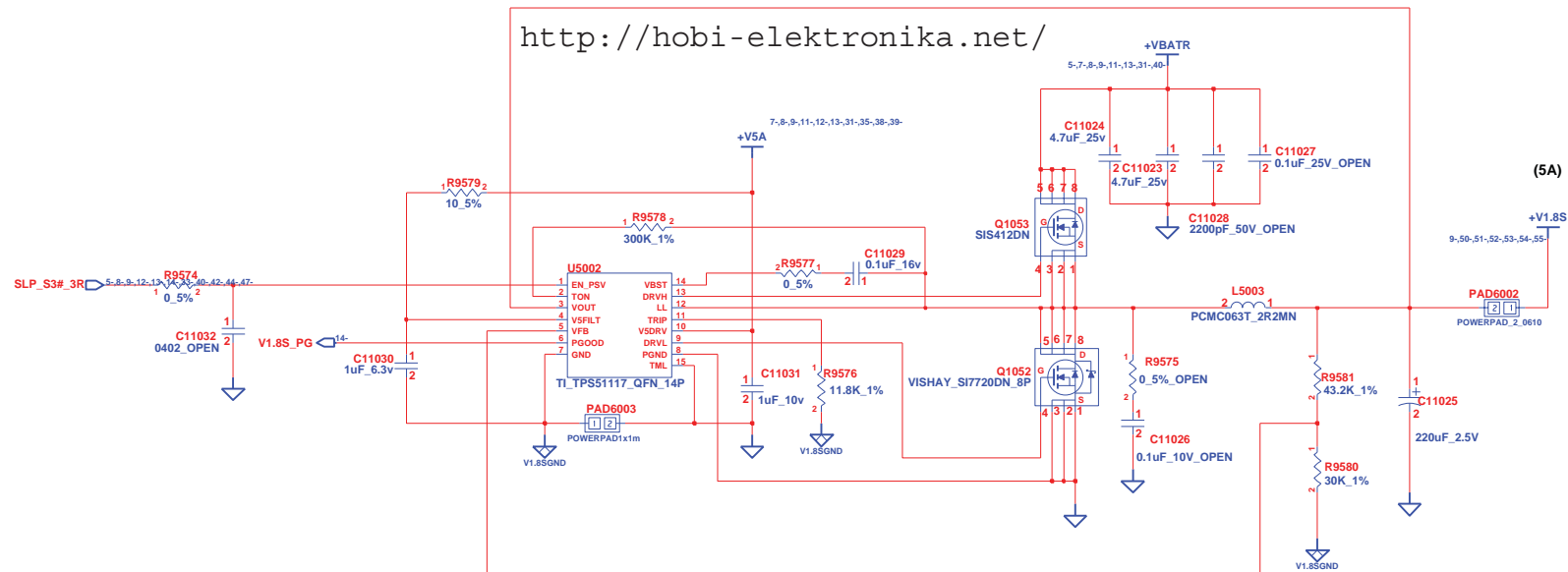
<http://hobi-elektronika.net/>

INVENTEC

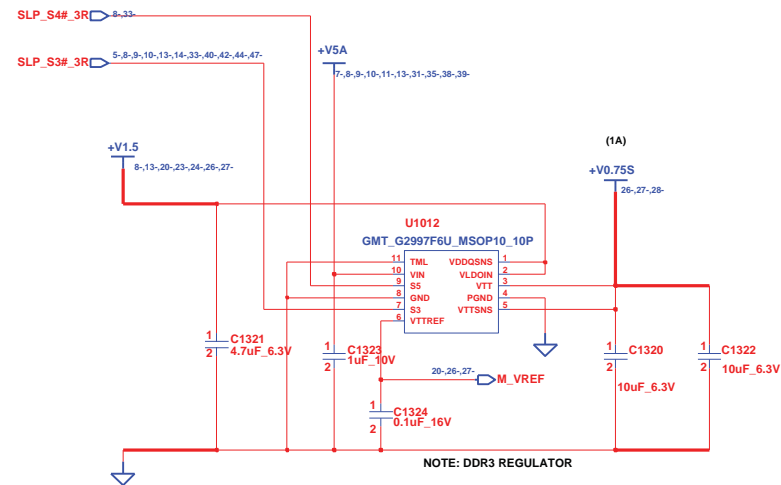
TITLE	<i>Hublot_Discrete</i> <i>Graphic Power (+VDD_CORE & +VPCIE)</i>
-------	---

SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MTRA01	REV
SHEET		9	OF 60

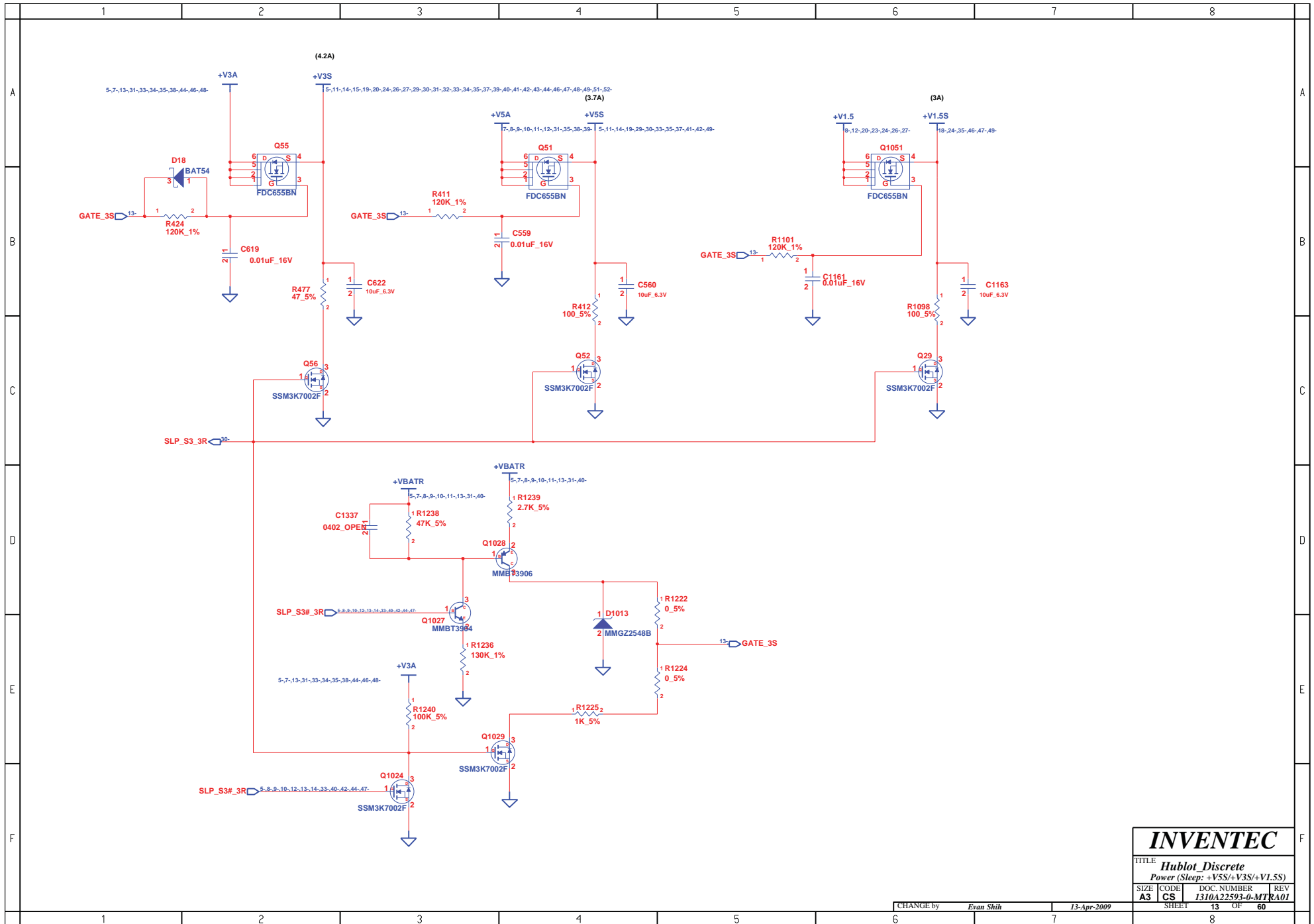
CHANGE by	<i>Evan Shih</i>	<i>13-Apr-2009</i>
-----------	------------------	--------------------



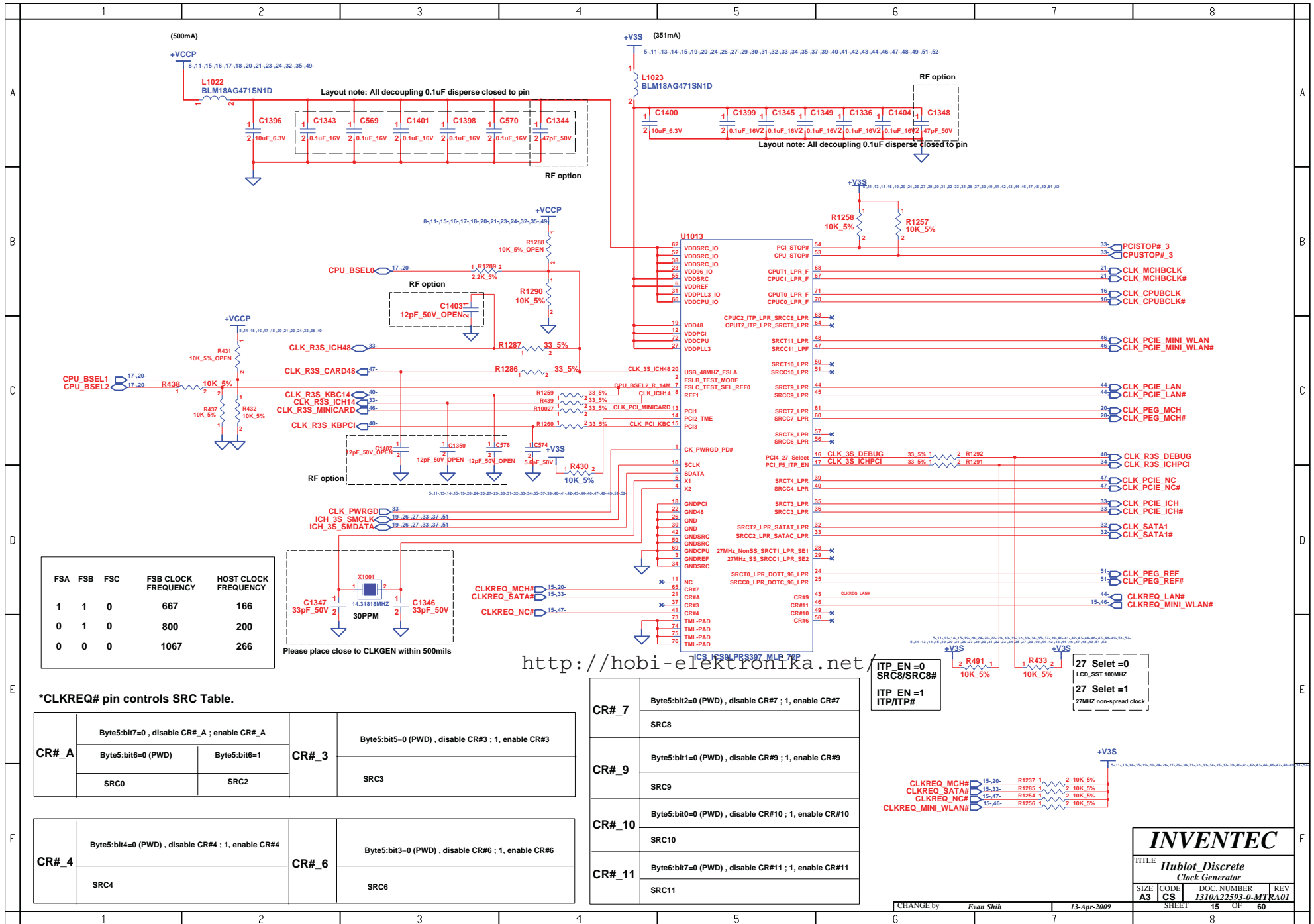
INVENTEC			
TITLE Hublot Discrete VRAM Power (+V1.8S)			
SIZE A3	CODE CS	DOC. NUMBER I310A22593-0-MT	REV A01
CHANGE by Evan Shih		13-Apr-2009	
SHEET 10		OF 60	

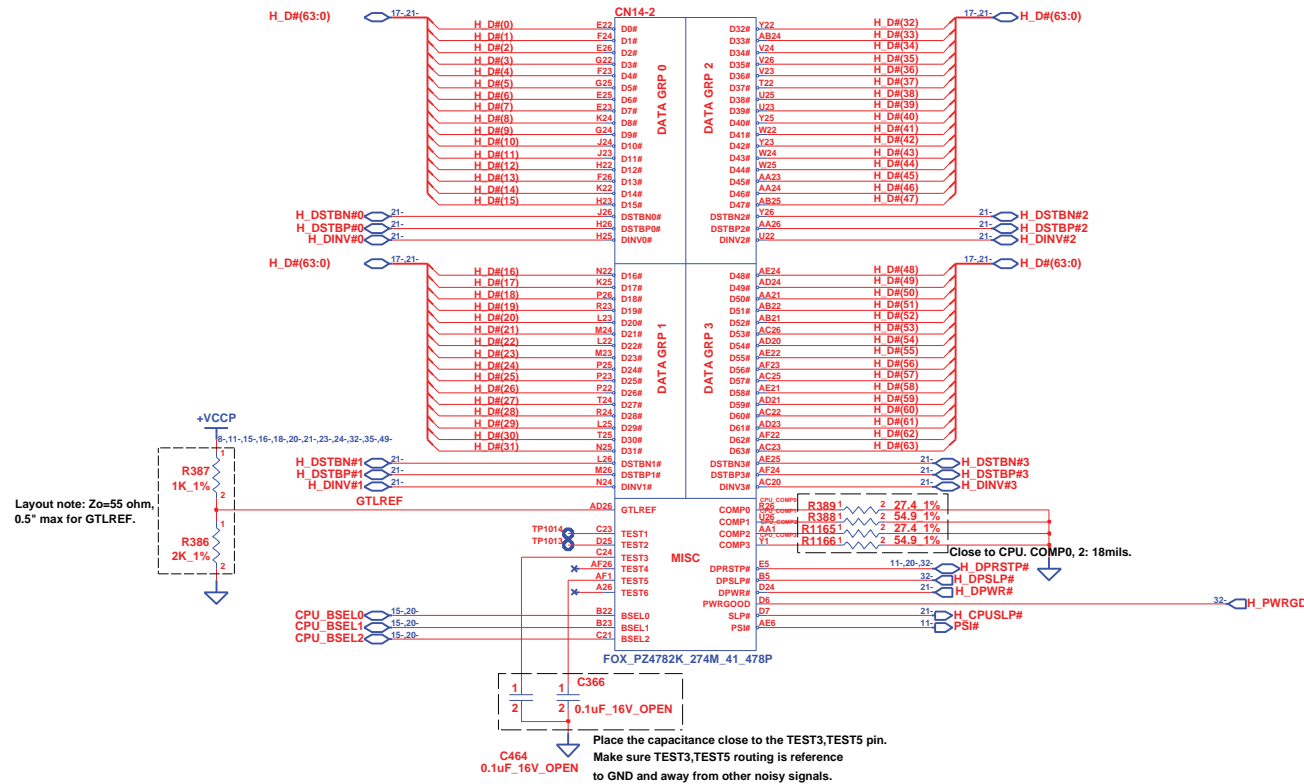


INVENTEC			
TITLE Hublot_Discrete			
DDR Termination Voltage (+V0.75S)			
SIZE	CODE	DOC. NUMBER	REV
A3	CS	1310A22593-0-MT	RA01
CHANGE by		13-Apr-2009	
Evan Shih			
SHEET		12	OF 60



INVENTEC			
TITLE: Hublot_Discrete			
Power (Sleep: +V5S/+V3S/+V1.5S)			
SIZE: A3	CODE: CS	DOC. NUMBER: 1310A22593-0-MT	REV: A01
CHANGE by: Evan Skih		13-Apr-2009	
SHEET: 13		OF: 60	

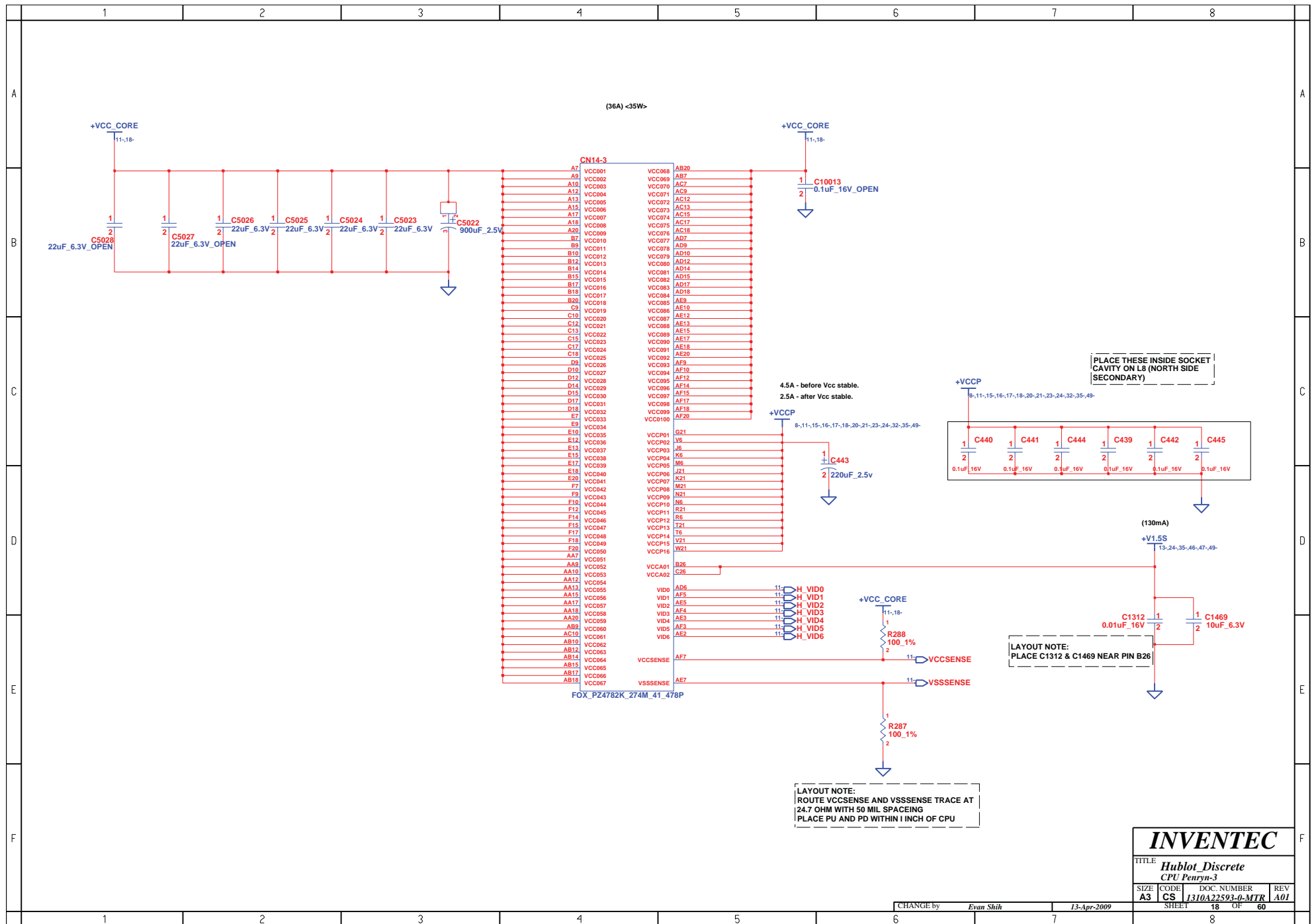




INVENTEC

TITLE Hublot_Discrete CPU Penryn-2			
SIZE A3	CODE CS	DOC. NUMBER J310A22593-0-MTR	REV A01
SHEET 17		OF 60	

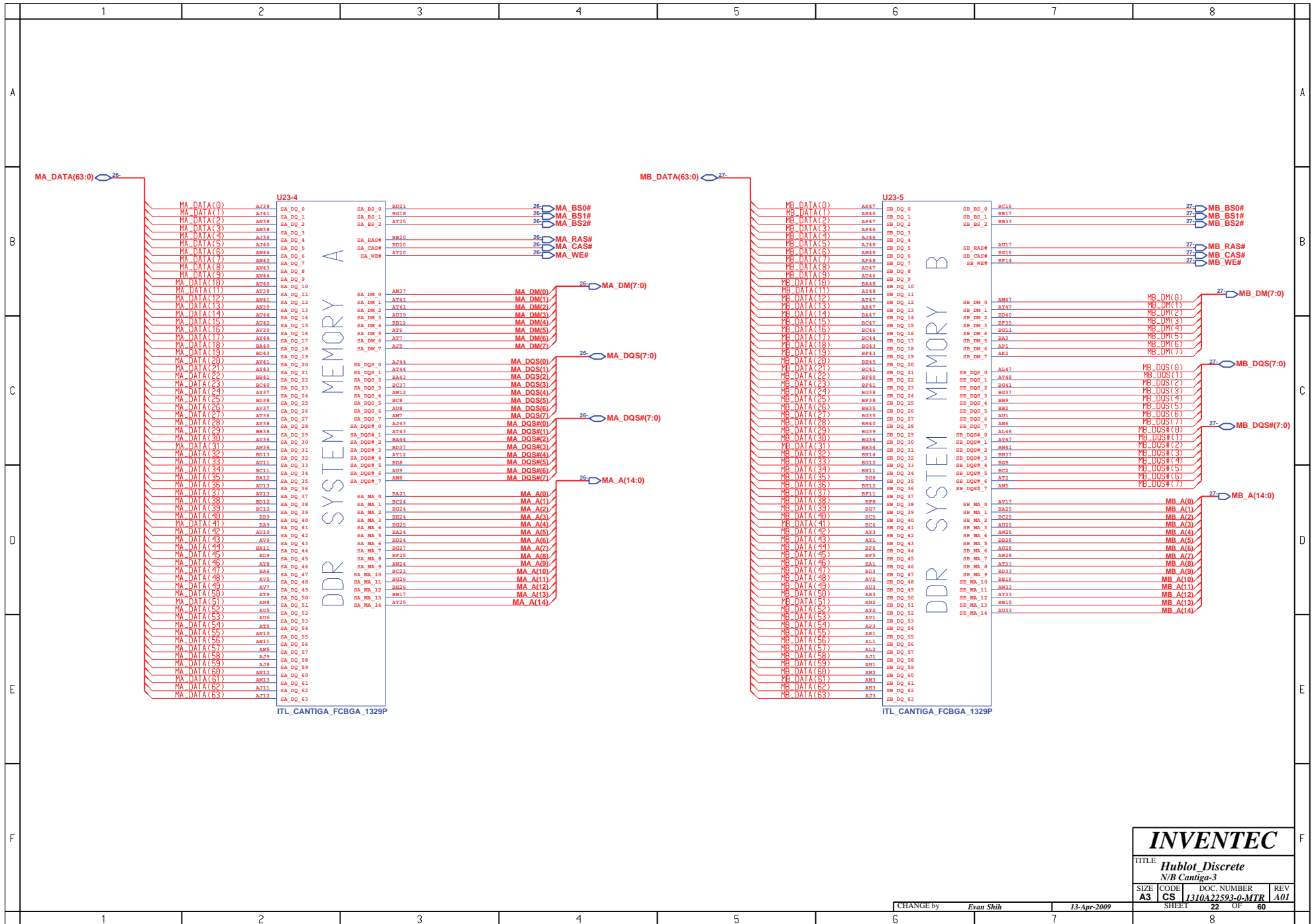
CHANGE by *Evan Shih* 13-Apr-2009

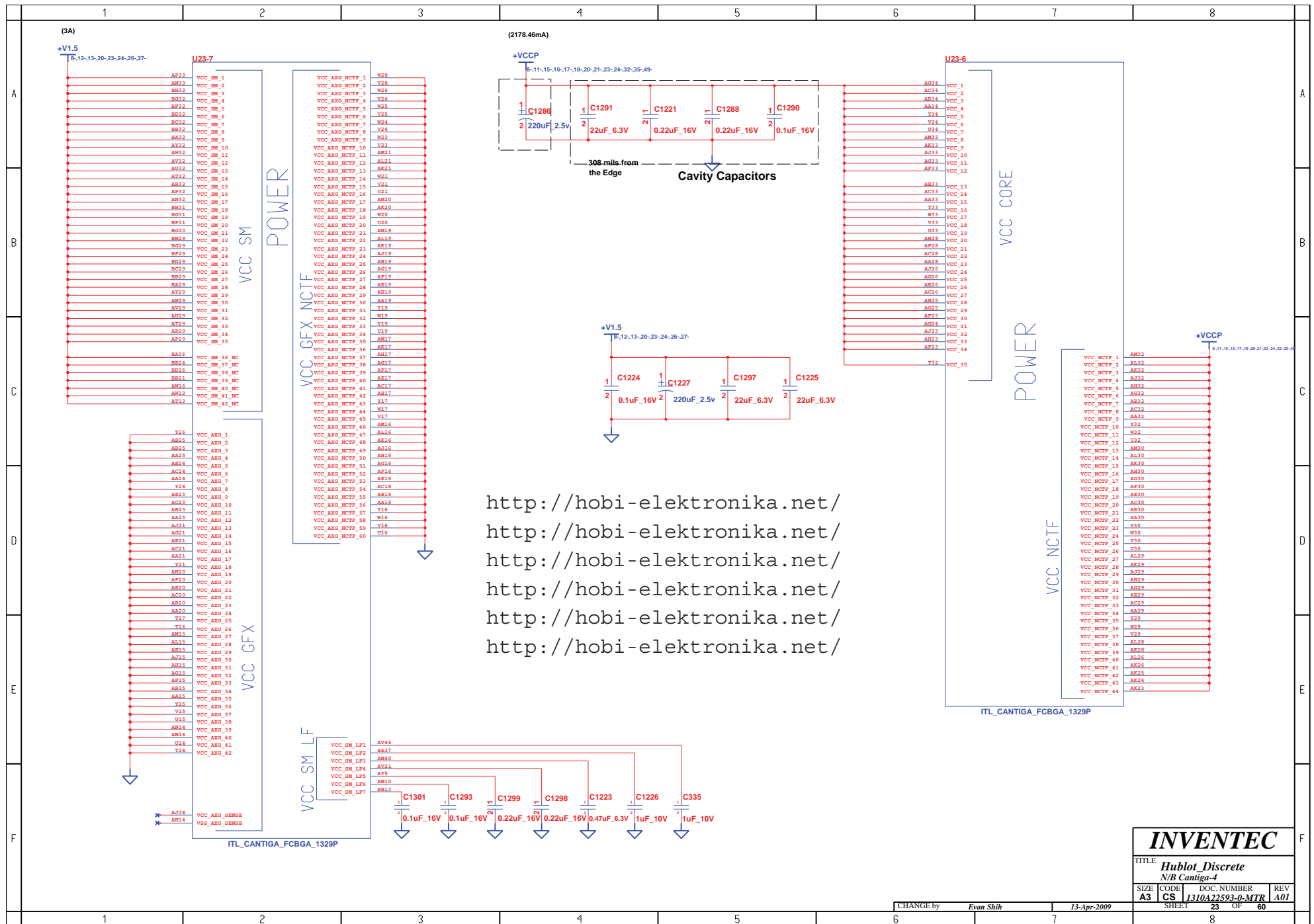


INVENTEC

TITLE Hublot_Discrete CPU Penryn-3			
SIZE A3	CODE CS	DOC. NUMBER J310A22593-0-MTR	REV A01
SHEET 18		OF 60	

CHANGE by *Evan Skih* 13-Apr-2009



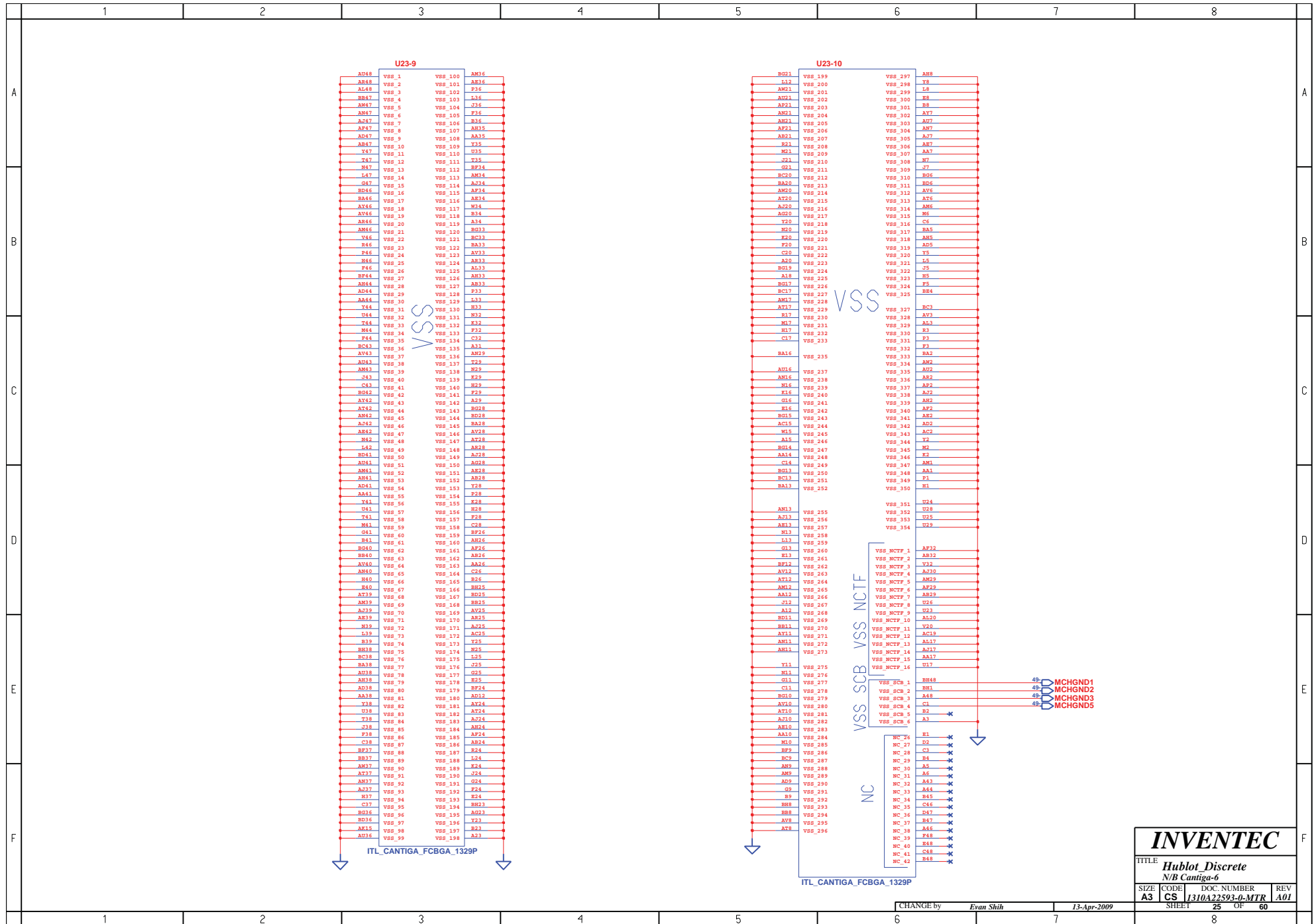


<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>

INVENTEC

TITLE Hublot_Discrete N/B Cantiga-4			
SIZE A3	CODE CS	DOC. NUMBER J310A22593-0-MTR	REV A01
SHEET 23		OF 60	

CHANGE by *Evan Shih* 13-Apr-2009



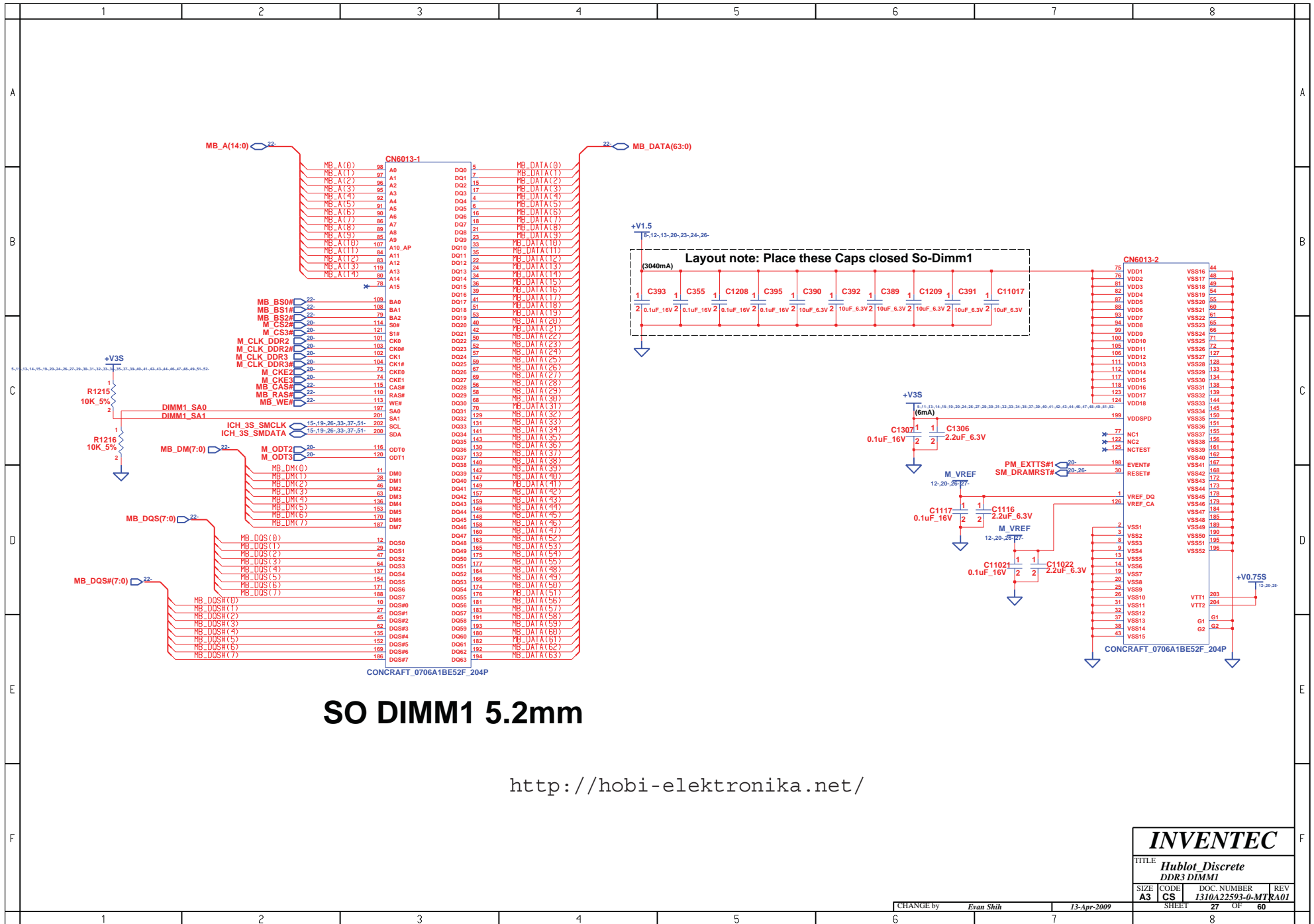
INVENTEC

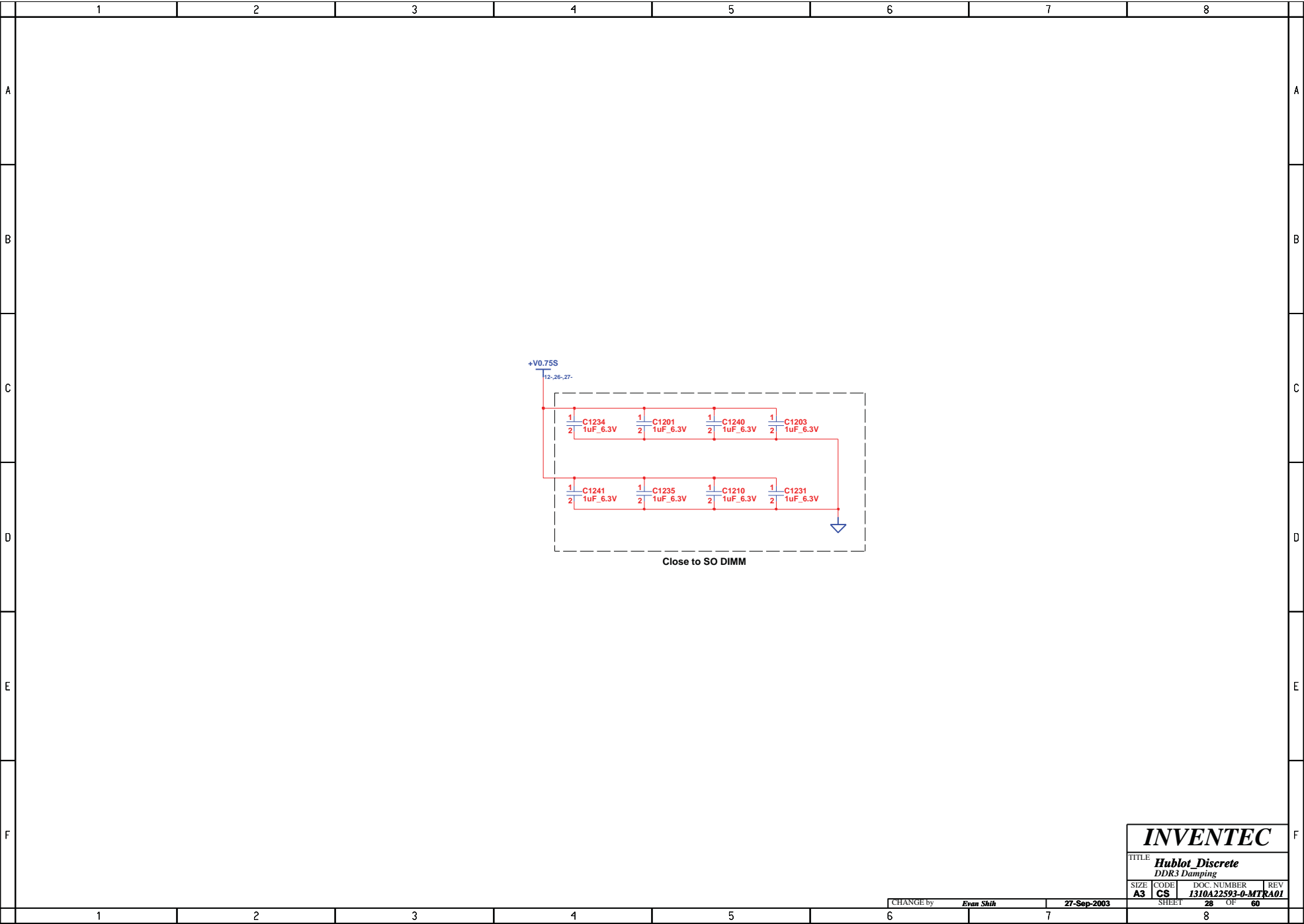
TITLE
Hublot Discrete
N/B Cantiga-6

SIZE CODE DOC. NUMBER REV
A3 CS 1310A22593-0-MTR A01

SHEET 25 OF 60

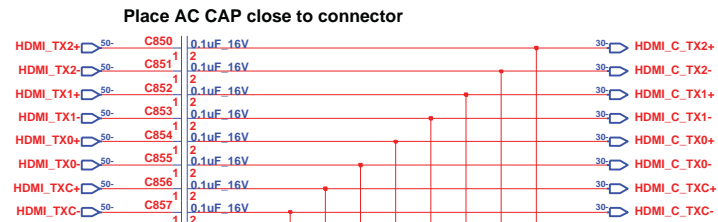
CHANGE by Evan Shih 13-Apr-2009



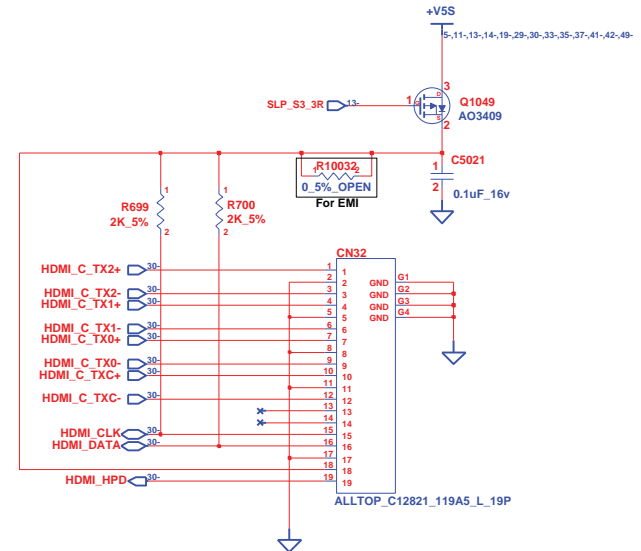
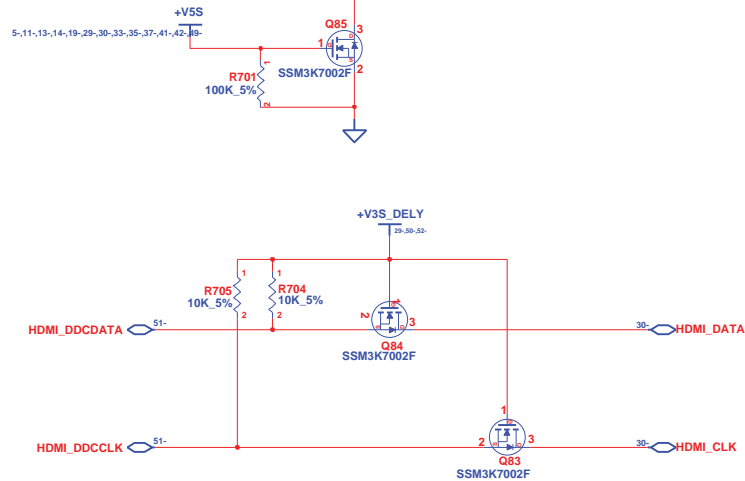


INVENTEC			
TITLE Hublot Discrete DDR3 Damping			
SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MTR	REV A01
SHEET		28	OF 60

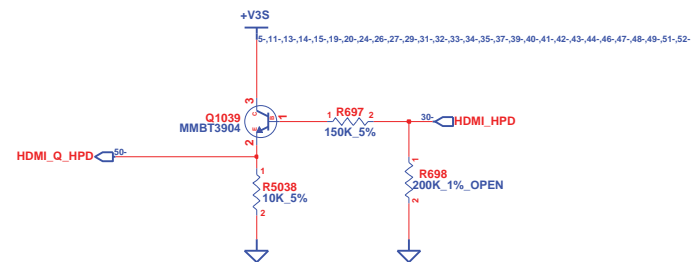
CHANGE by *Evan Shih* 27-Sep-2003



Place pull down RES close to differential pairs



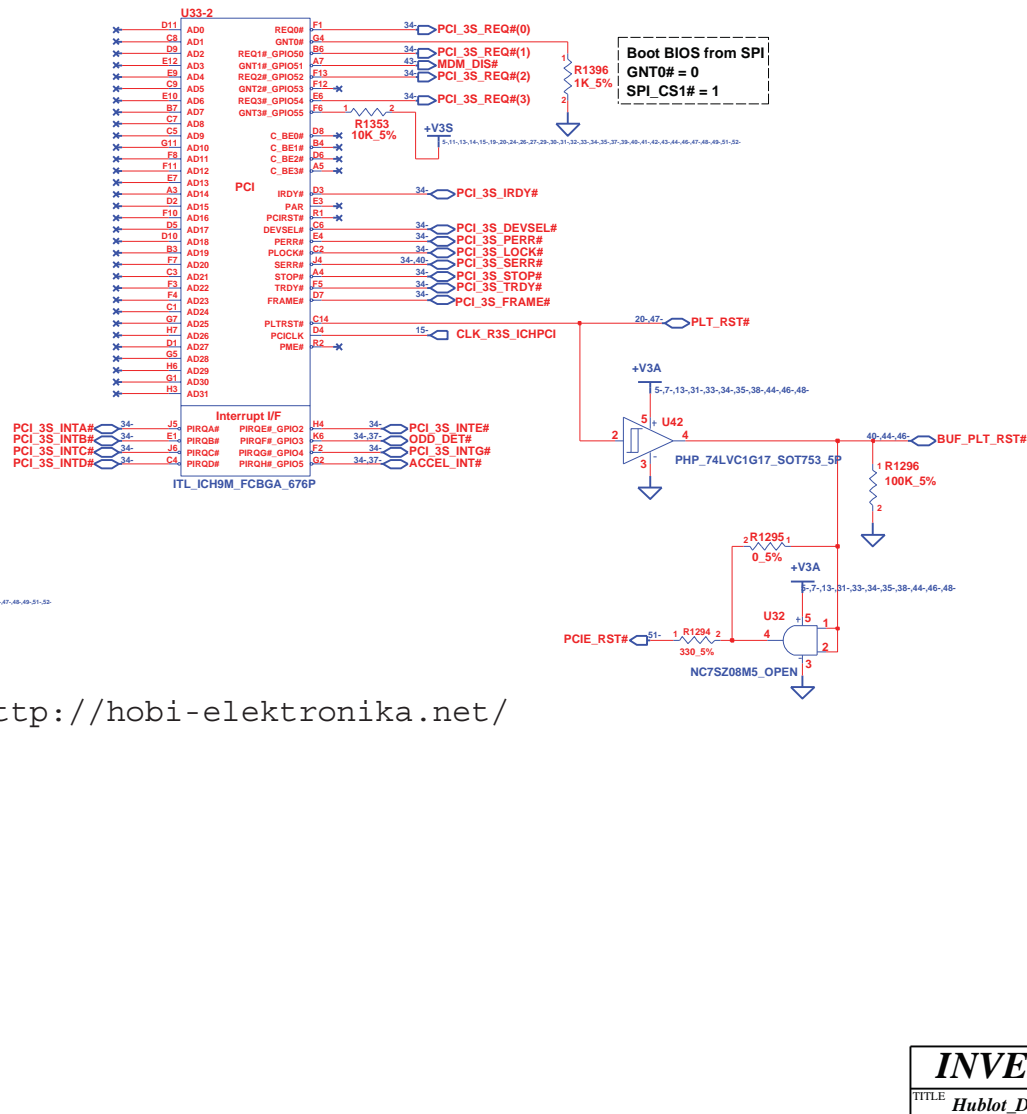
HDMI CONN



INVENTEC

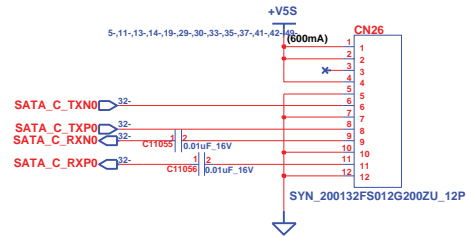
TITLE			
Hublot_Discrete			
HDMI Connector			
SIZE	CODE	DOC NUMBER	REV
A3	CS	1310A22593-0-MTR	A01
SHEET		30	OF 60

CHANGE by *Evan Skih* 13-Apr-2009

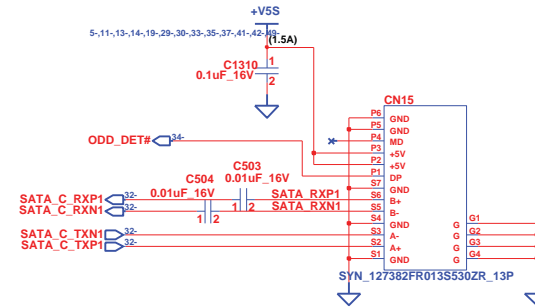


<http://hobi-elektronika.net/>

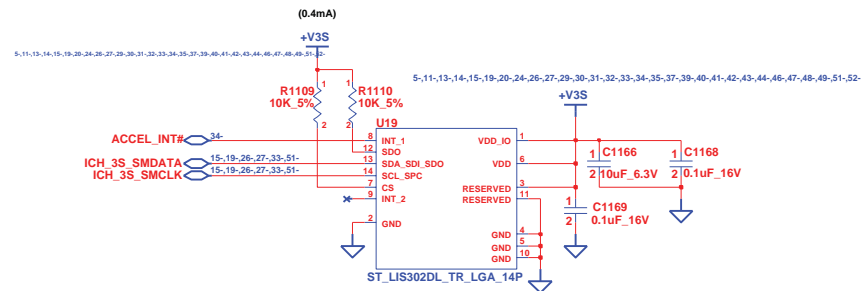
INVENTEC			
TITLE Hublot Discrete S/B ICH9-3			
SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MT	REV A01
CHANGE by Evan Shih		13-Apr-2009	
SHEET 34		OF 60	



SATA HDD B to B CONN

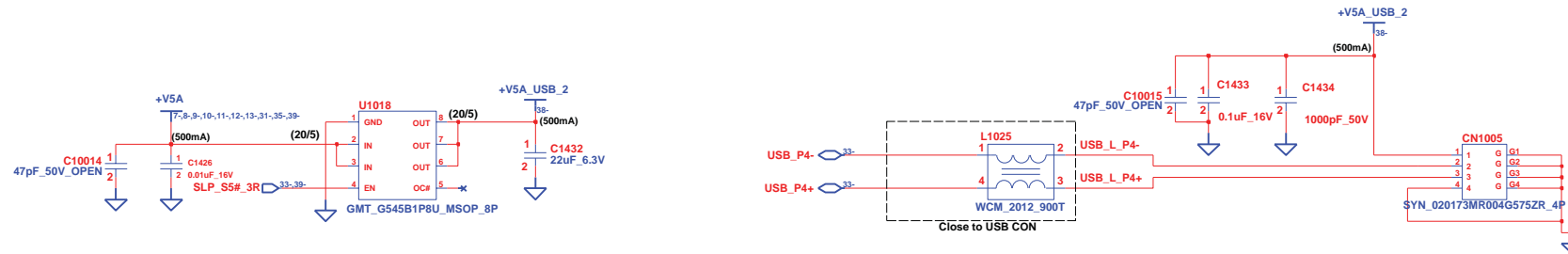


SATA ODD

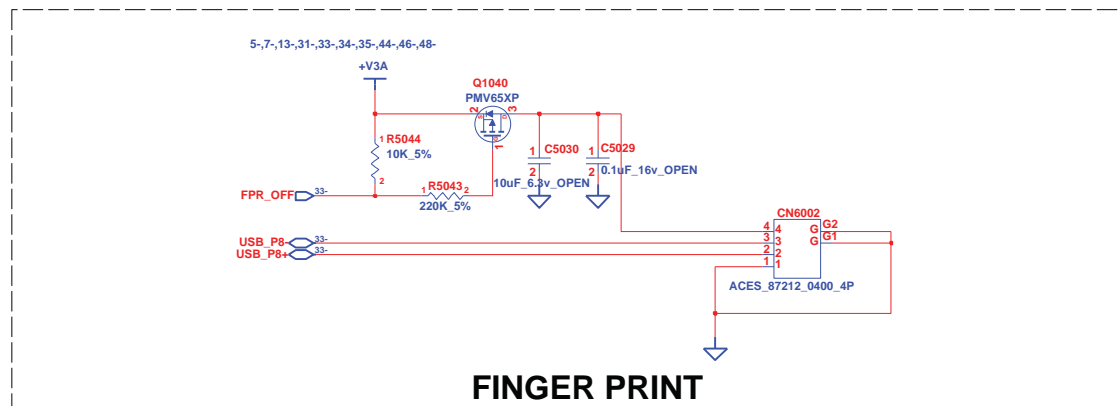


Accelerometer

INVENTEC			
TITLE			
Hublot_Discrete			
HDD & ODD CONN & Accelerometer			
SIZE	CODE	DOC. NUMBER	REV
A3	CS	1310A22593-0-MT	RA01
CHANGE by		DATE	SHEET
Evan Shih		13-Apr-2009	37 OF 60

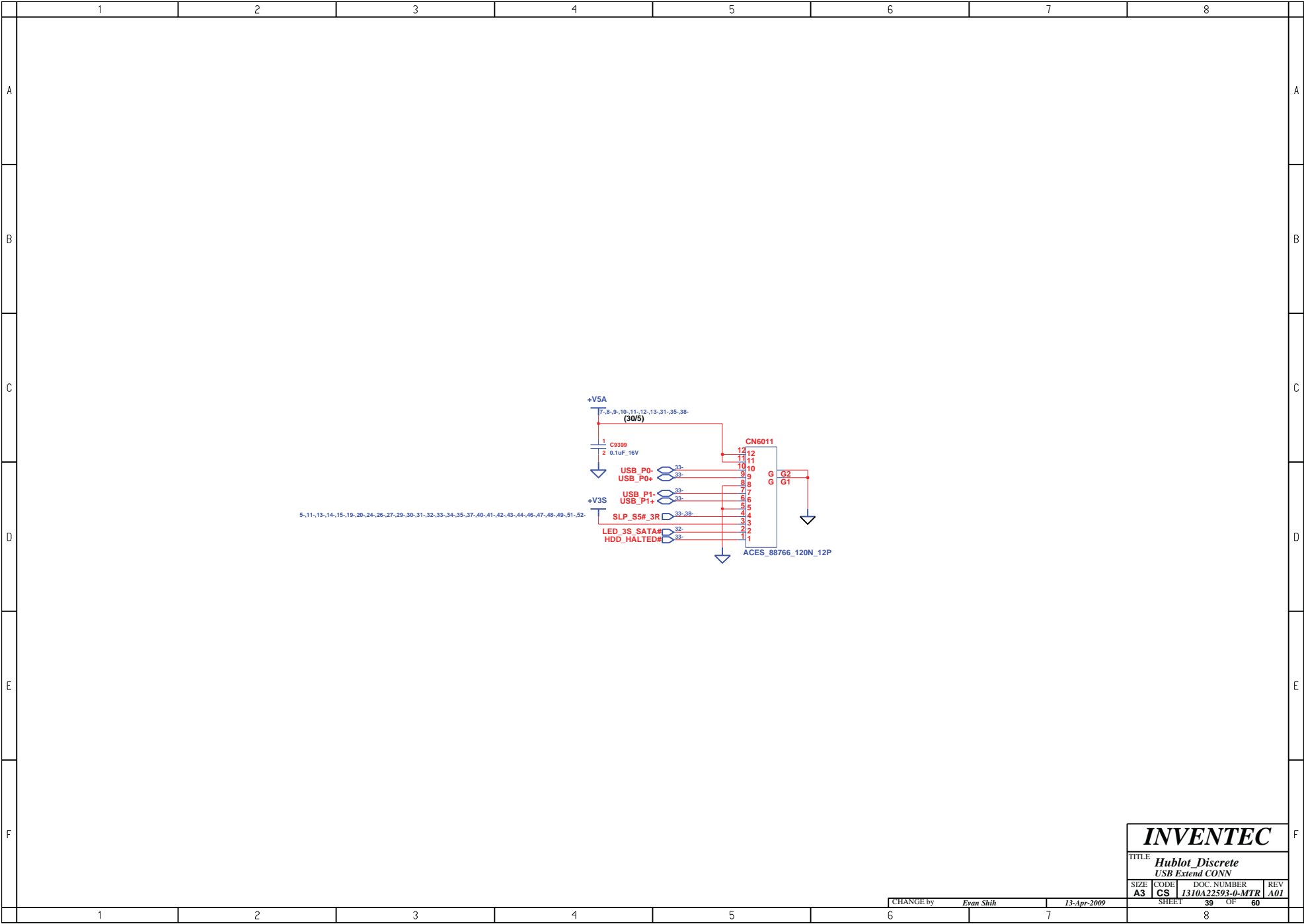


<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>



FINGER PRINT

INVENTEC			
TITLE Hublot_Discrete USB & Finger Print CONN			
SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MT	REV A01
CHANGE by Evan Shih		13-Apr-2009	
SHEET		38 OF 60	



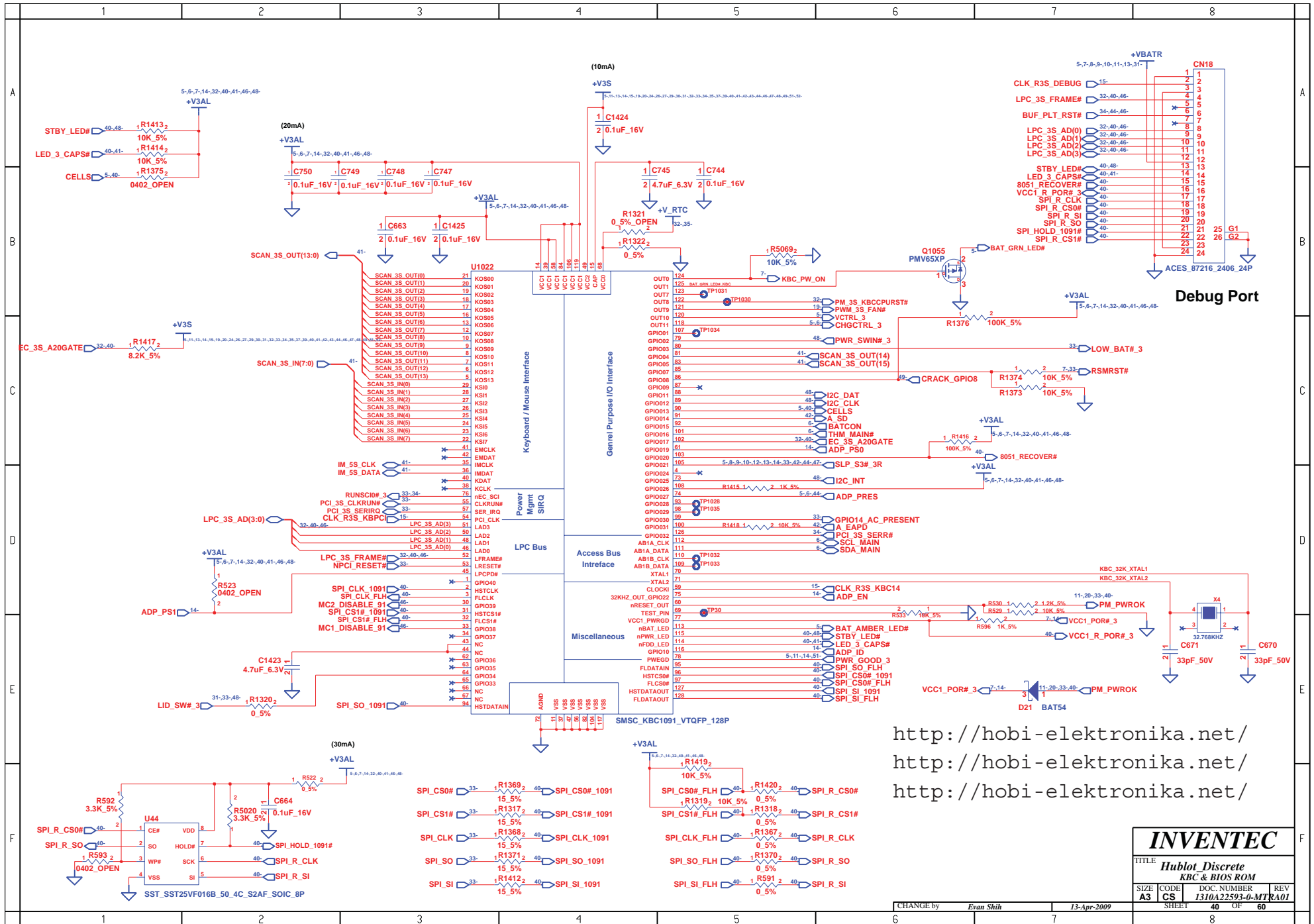
INVENTEC

TITLE
**Hublot_Discrete
USB Extend CONN**

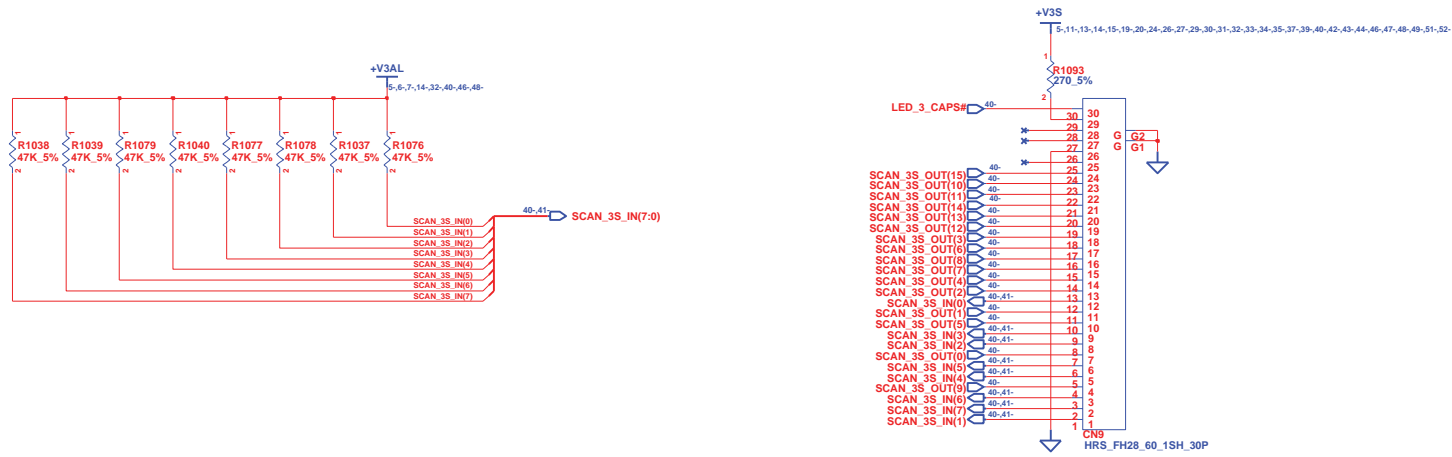
SIZE	CODE	DOC. NUMBER	REV
A3	CS	I310A22593-0-MTR	A01

CHANGE by *Evan Shih* 13-Apr-2009

SHEET 39 OF 60

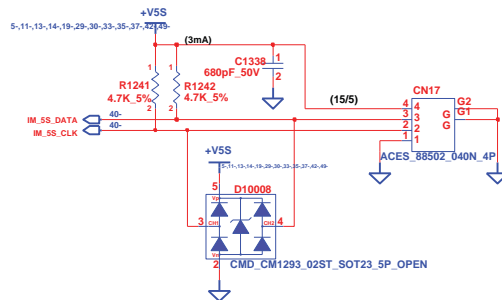


http://hobi-elektronika.net/
 http://hobi-elektronika.net/
 http://hobi-elektronika.net/



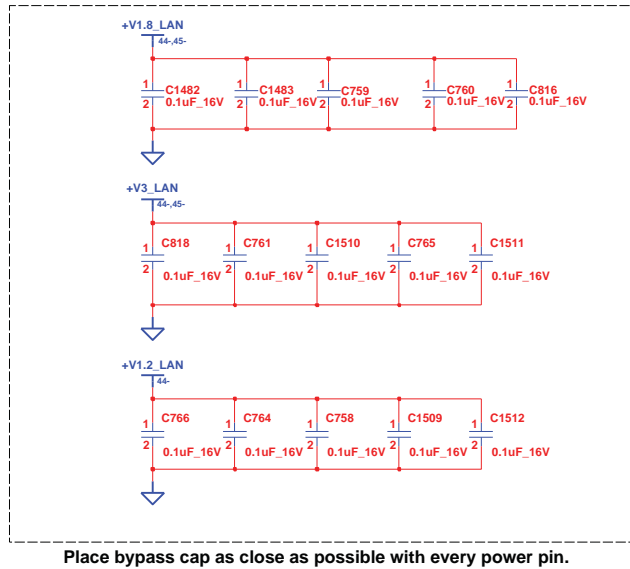
Keyboard CONN

Touch Pad CONN

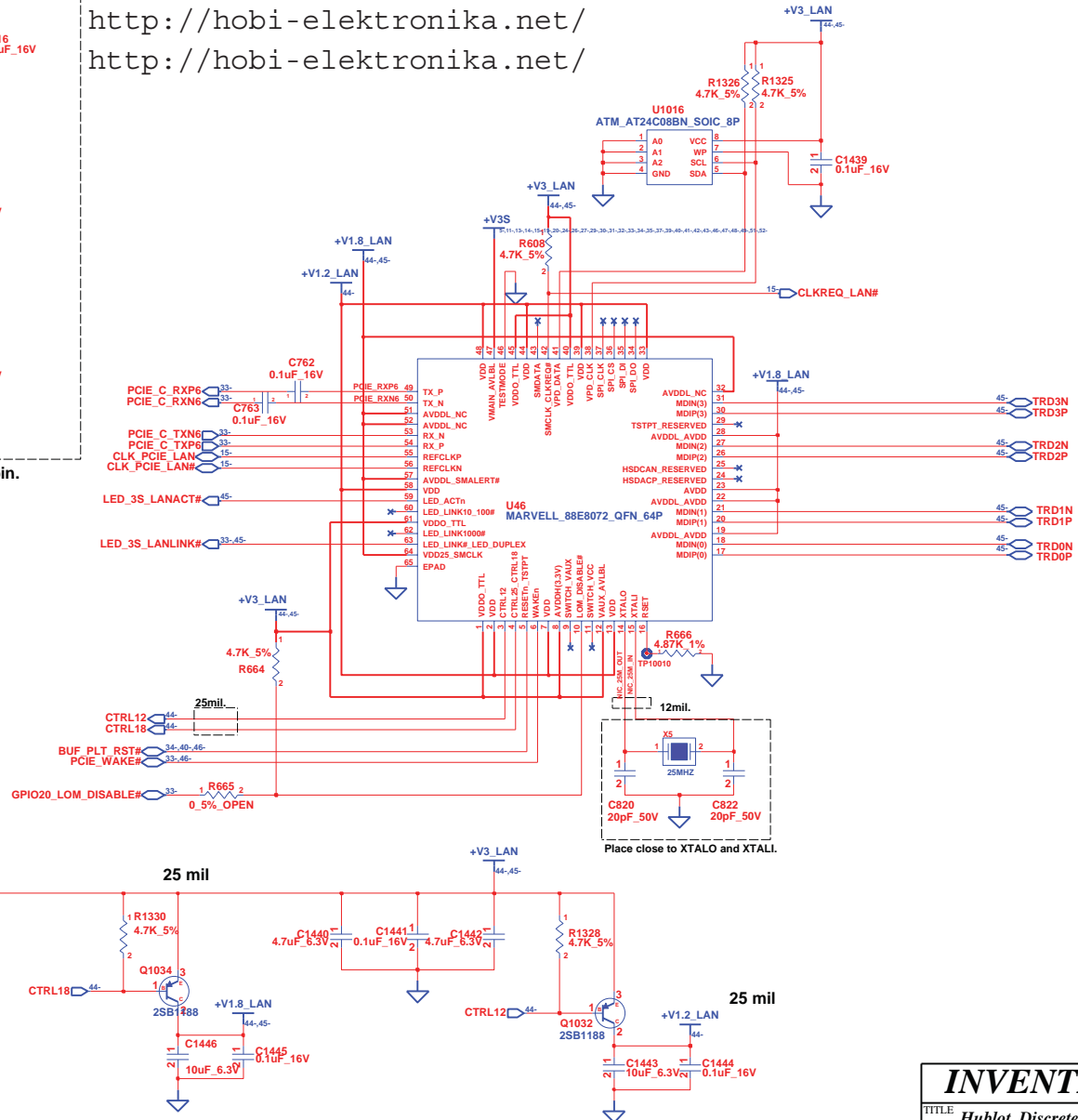


INVENTEC			
TITLE			
Hublot Discrete			
Keyboard & TouchPad CONN			
SIZE	CODE	DOC NUMBER	REV
A3	CS	I310A22593-0-MTKA01	
SHEET		41	OF 60

CHANGE by Evan Shih 13-Apr-2009



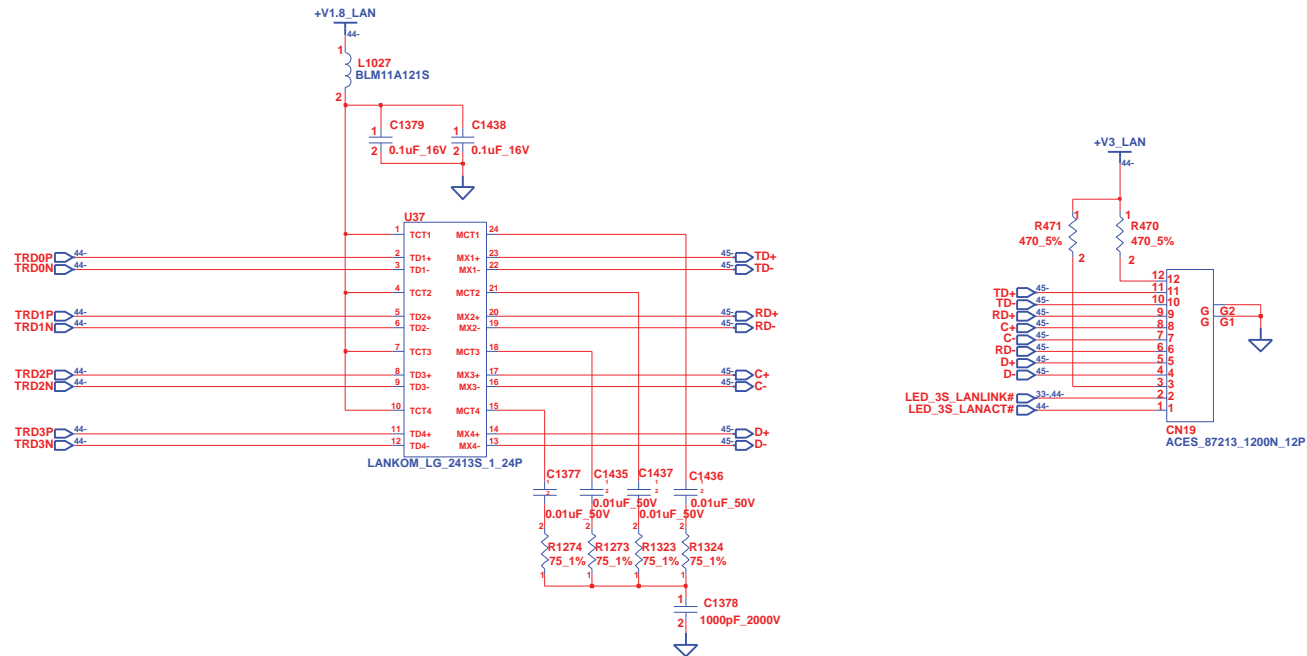
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>



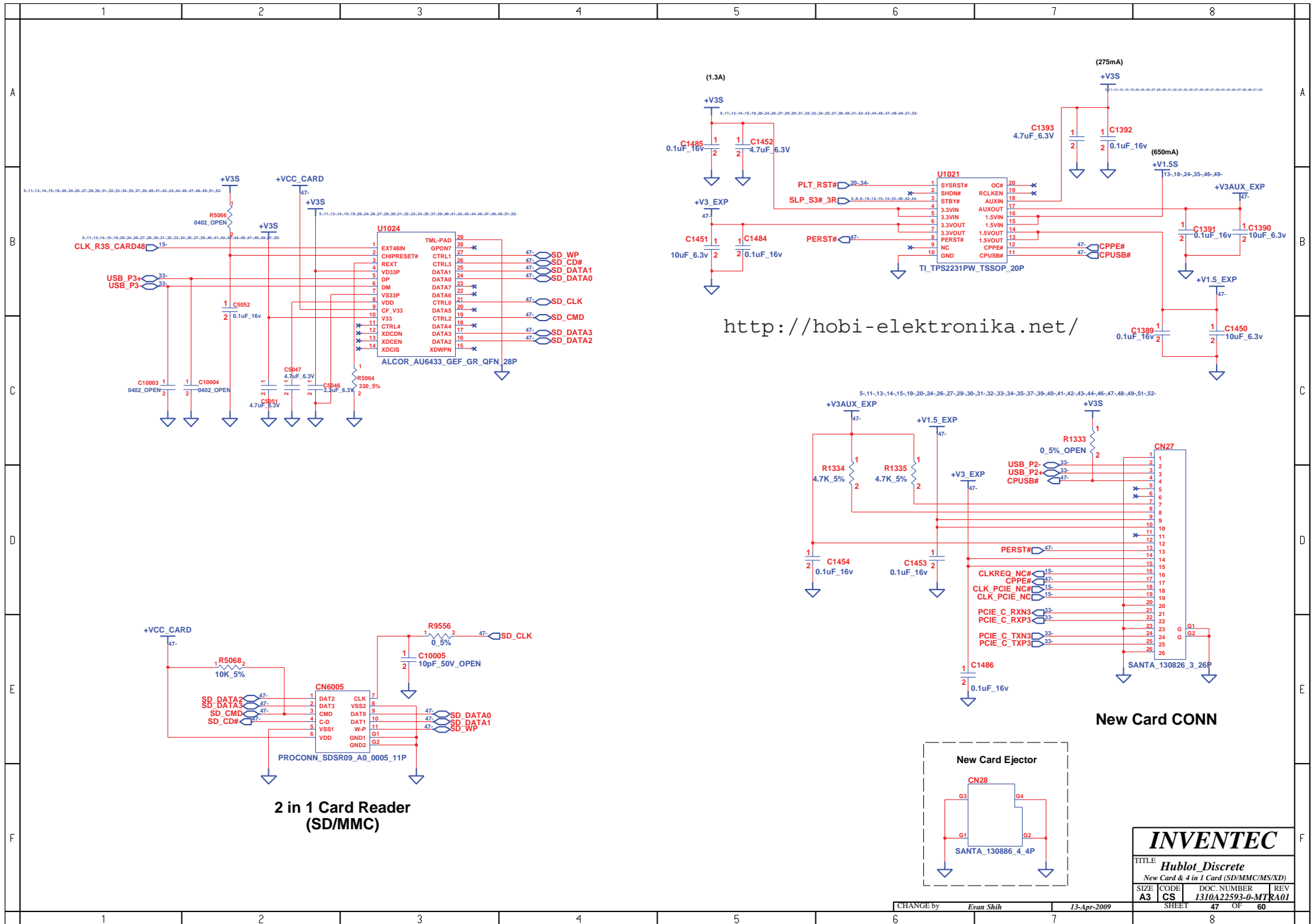
INVENTEC

TITLE: Hublot Discrete
 Giga LAN Controller
 SIZE: A3 CODE: CS DOC. NUMBER: 1310A22593-0-MTR A01 REV: 13-APR-2009

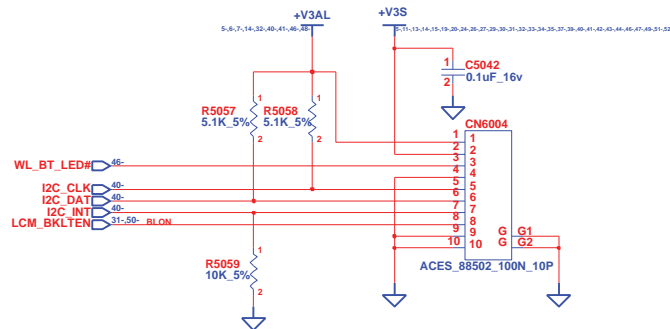
CHANGE by: Evan Skih SHEET 44 OF 60



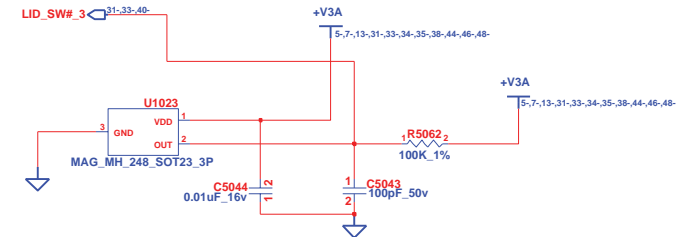
INVENTEC			
TITLE: Hublot Discrete Magnetic & RJ45 CONN			
SIZE: A3	CODE: CS	DOC. NUMBER: 1310A22593-0-MTR	REV: A01
CHANGE by: Evan Shih		13-Apr-2009	
SHEET: 45		OF: 60	



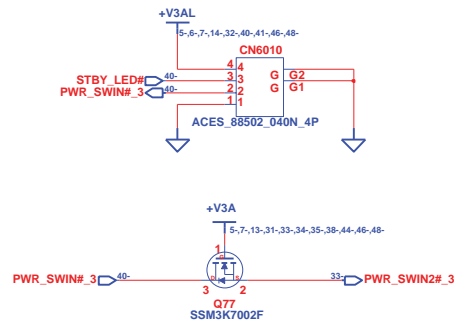
SWITCH BOARD CONN



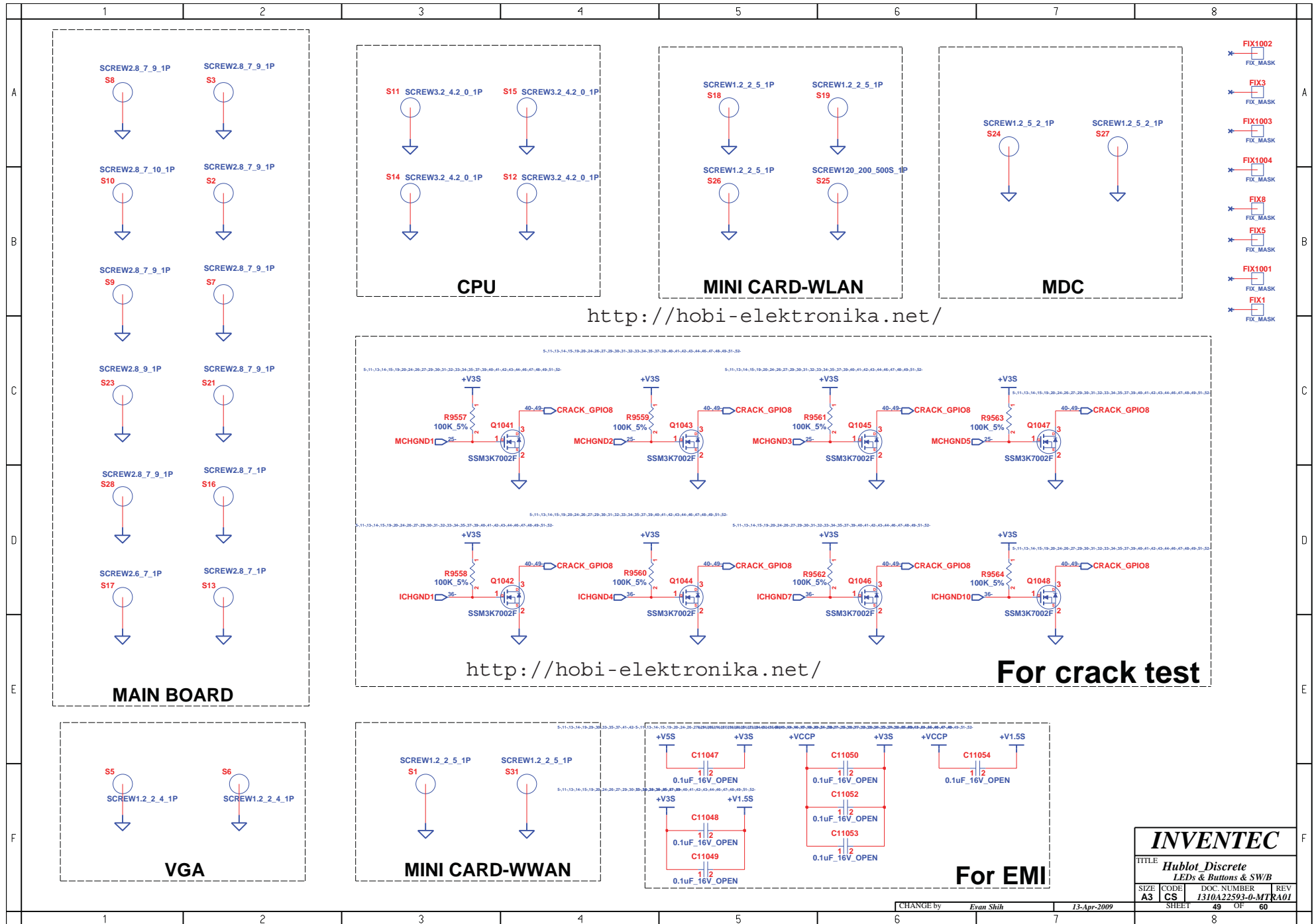
LID SWITCH

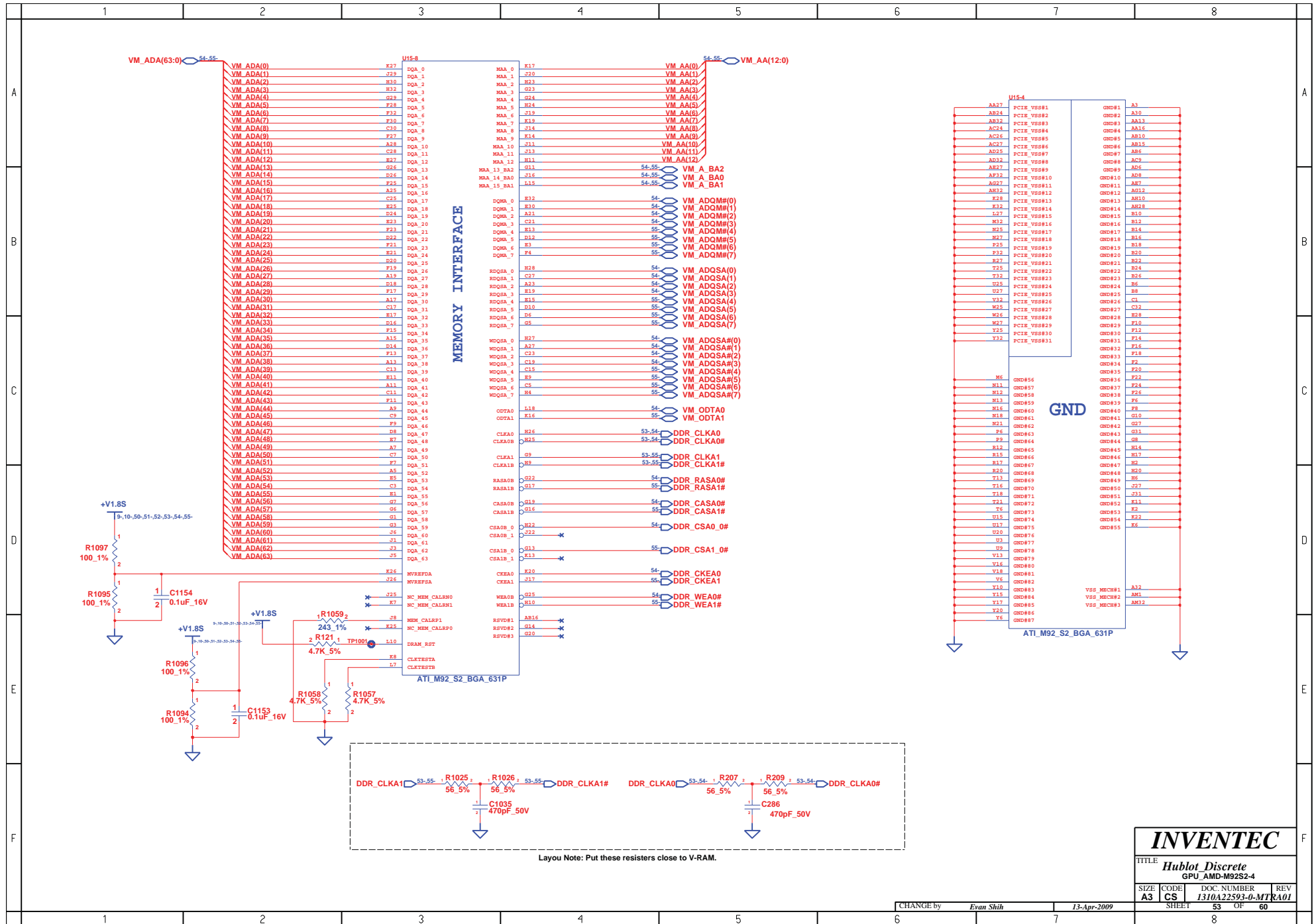


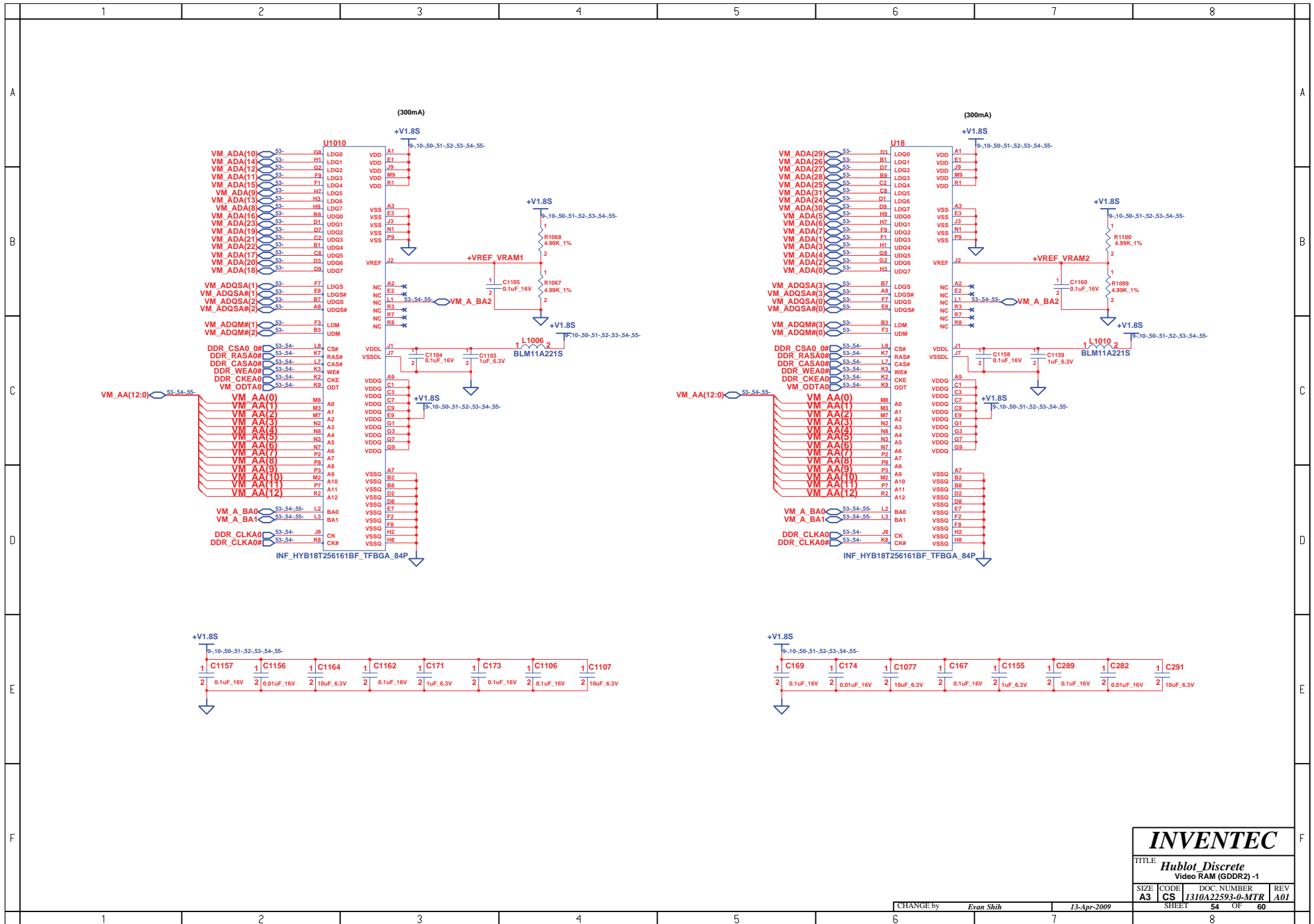
Power SW CONN



INVENTEC			
TITLE Hublot_Discrete LEDs & Buttons & SW/B CONN			
SIZE A3	CODE CS	DOC. NUMBER 1310A22593-0-MTR	REV A01
CHANGE by Evan Shih		13-Apr-2009	
SHEET		48 OF 60	



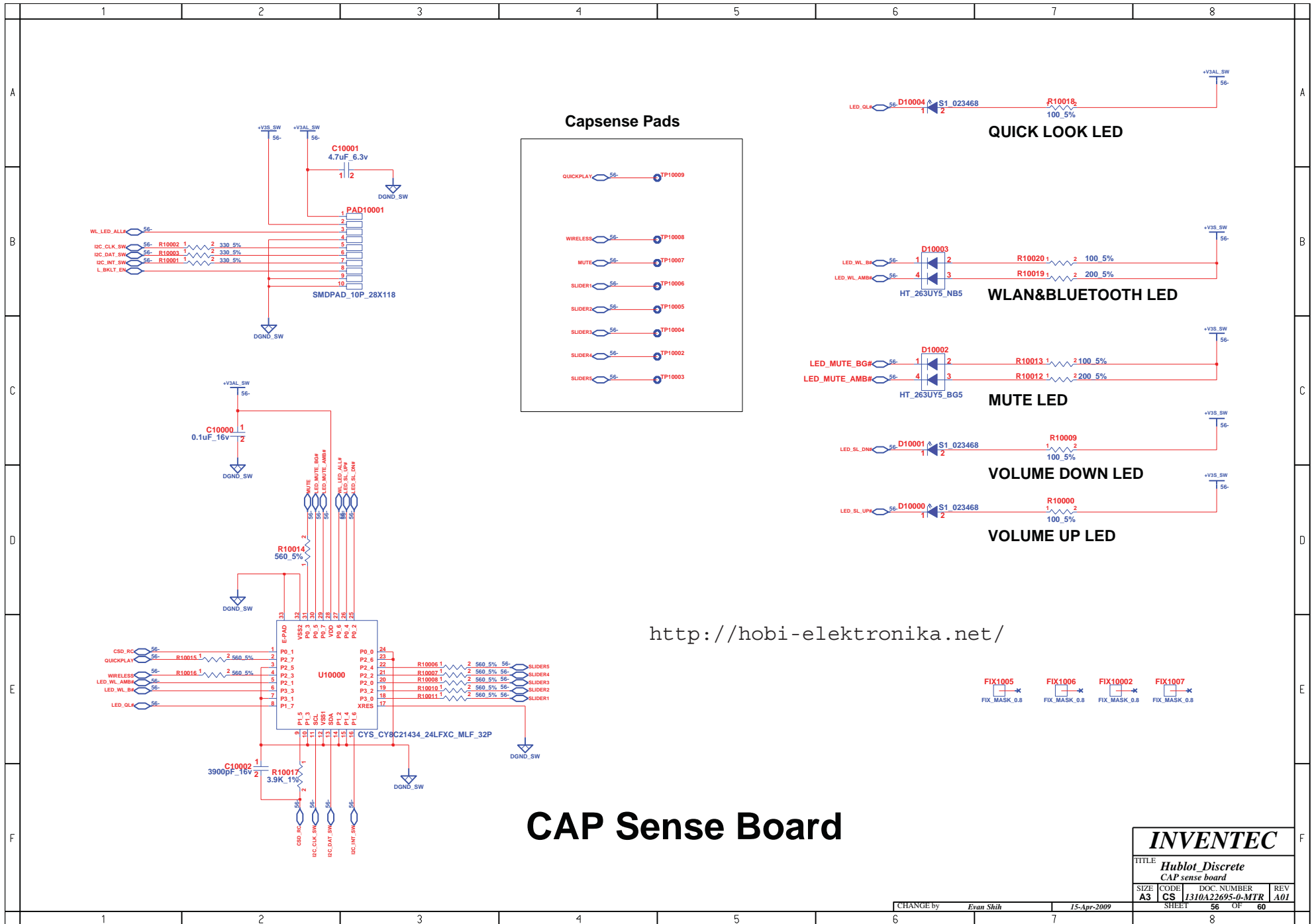




INVENTEC

TITLE			
Hublot Discrete			
Video RAM (GDDR2) -1			
SIZE	CODE	DOC. NUMBER	REV
A3	CS	J310A22593-0-MTR	A01
SHEET		54	OF 60

CHANGE by *Evan Skih* 13-Apr-2009

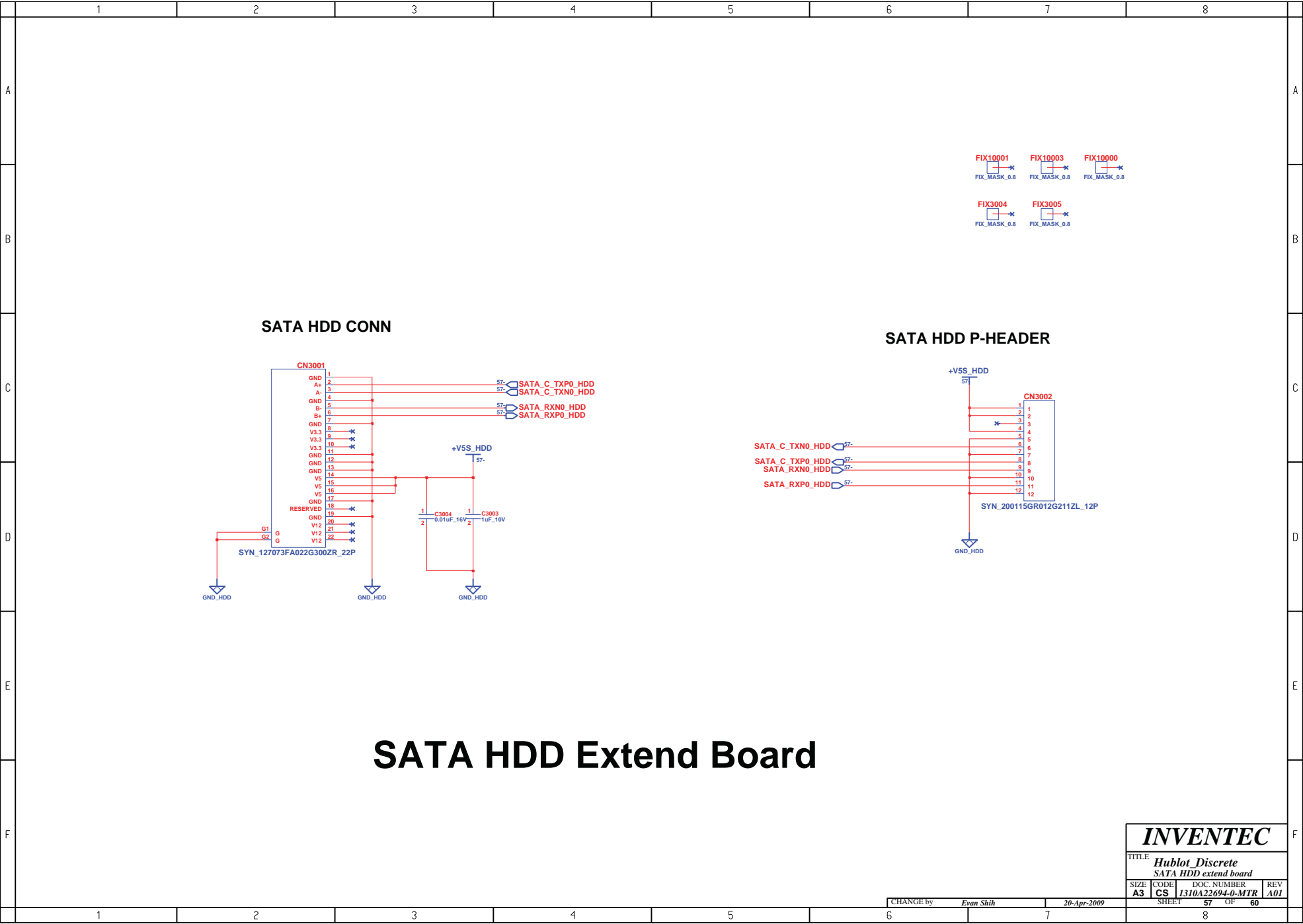


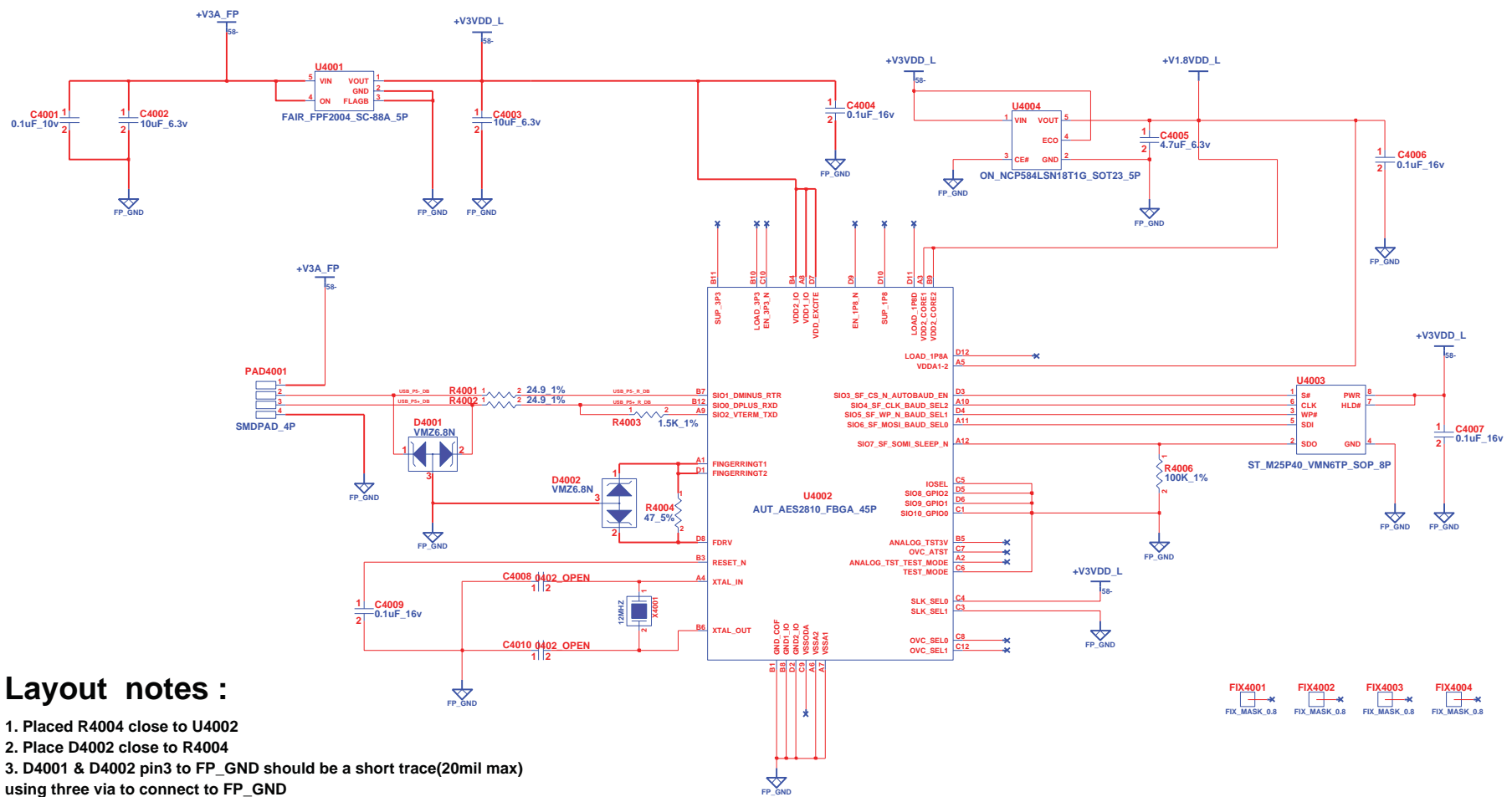
INVENTEC

TITLE Hublot_Discrete CAP sense board			
SIZE A3	CODE CS	DOC. NUMBER I310A22695-0-MTR	REV A01

CHANGE by *Evan Shih* 15-Apr-2009

SHEET 56 OF 60





<http://hobi-elektronika.net/>

FINGER PRINT READER DAUGHTER BOARD

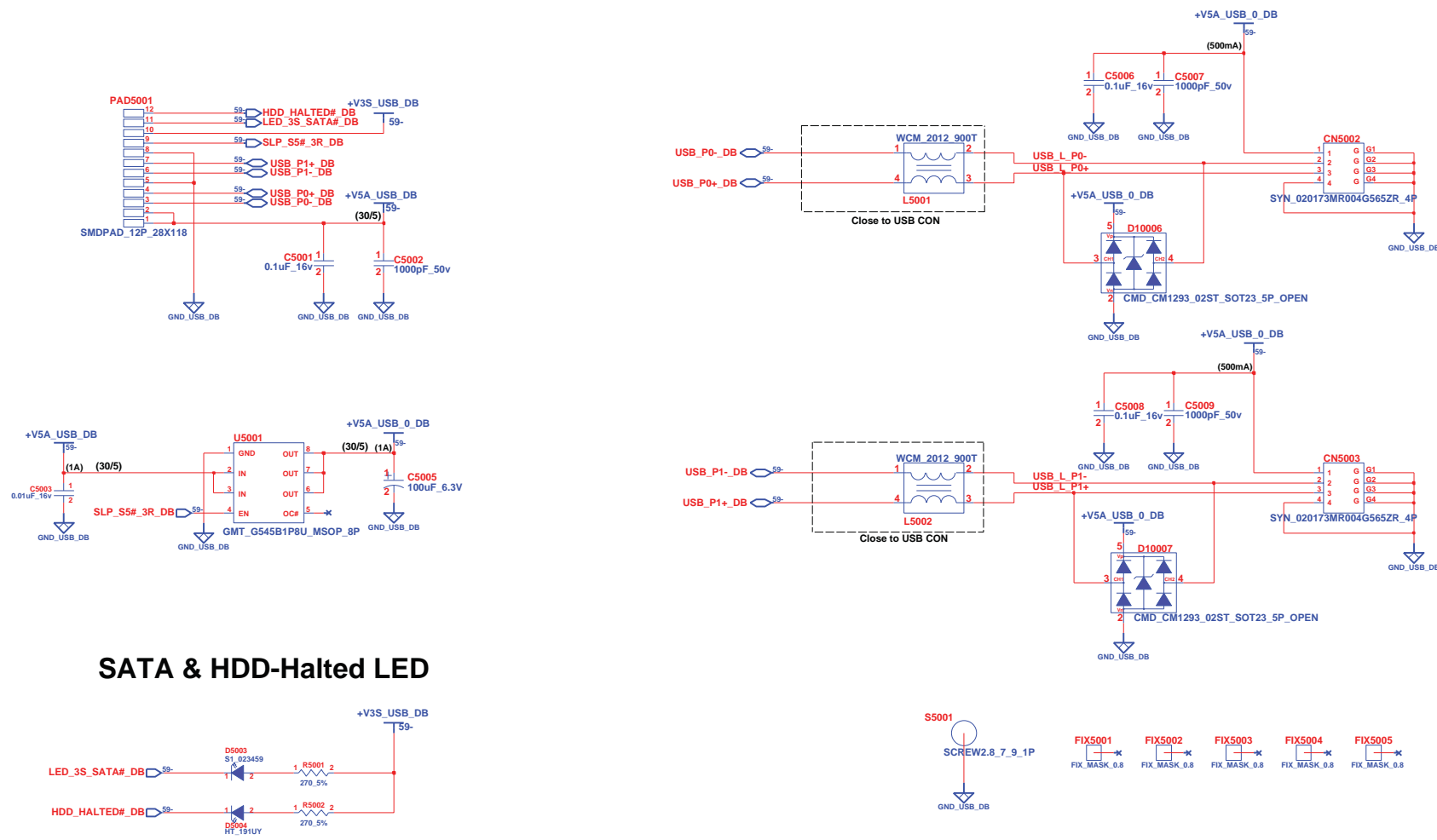
INVENTEC

TITLE
Hublot_Discrete
Finger print board

SIZE A3	CODE CS	DOC NUMBER I310A22693-0-MTR	REV A01
------------	------------	--------------------------------	------------

CHANGE by *Evan Skih* 13-Apr-2009

SHEET 58 OF 60



SATA & HDD-Halted LED

USB Extend Board

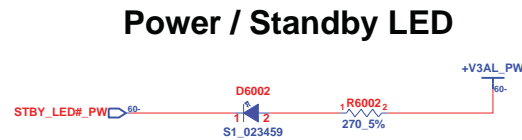
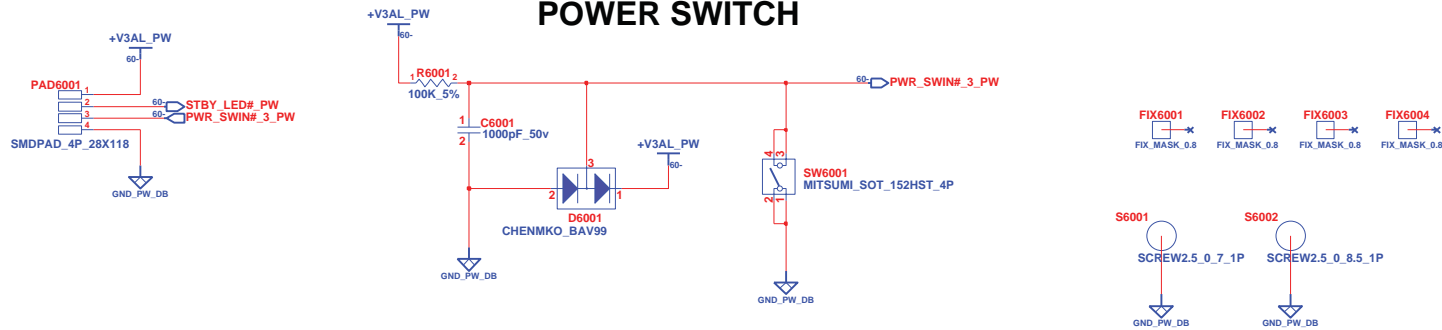
INVENTEC

TITLE
Hublot_Discrete
USB extend board

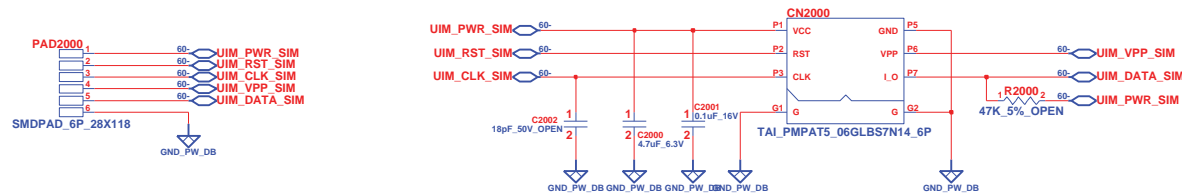
SIZE	CODE	DOC. NUMBER	REV
A3	CS	I310A22692-0-MTR	A01

CHANGE by *Evan Skih* 15-Apr-2009

SHEET 59 OF 60



<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>
<http://hobi-elektronika.net/>



Power Button & SIM Card Board

INVENTEC			
TITLE: Hublot_Discrete Power button & SIM Card board			
SIZE: A3	CODE: CS	DOC NUMBER: 1310A22699-0-MTR	REV: A01
CHANGE by: Evan Skih		13-Apr-2009	
SHEET: 60		OF: 60	