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# IH11K-MHS H110MG PRO VER 6.1

## CPU:

Intel Skylake S 42 in LGA1151 Package 95W

## System Chipset:

**SPT-H PCH**

## Main Memory:

Dual Channel/DDR-III*2(Max 16GB) 1066/1333/1600

## Onboard Device:

Super I/O:IT8613E
LAN:Realtek 8111H
HD Codec:ALC887

## Power solution:

CPU Voltage Regulators:3phase by RT3606 high 1 Low 1 OV by RT3606
DDR Voltage Regulators:1Phase by UP1514 high 1 Low 1 OV by IT8613E

## Expansion Slots:

PCI EXPRESS 16X SLOT *1
PCI EXPRESS 1X SLOT *2

## REAR IO:

PS/2 PORT
DVI Port
VGA Port
USB3.0 PORT *2
Gb RJ-45 +2 layer USB3.0 Ports
Audio Jackets (3 PORT)

## Front I/O:

SATA3 *6
USB 2.0 Header * 2 Serial header
USB 3.0 Header * 1 Front Audio Header
CPU FAN *1
System FAN *1



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Title: INDEX
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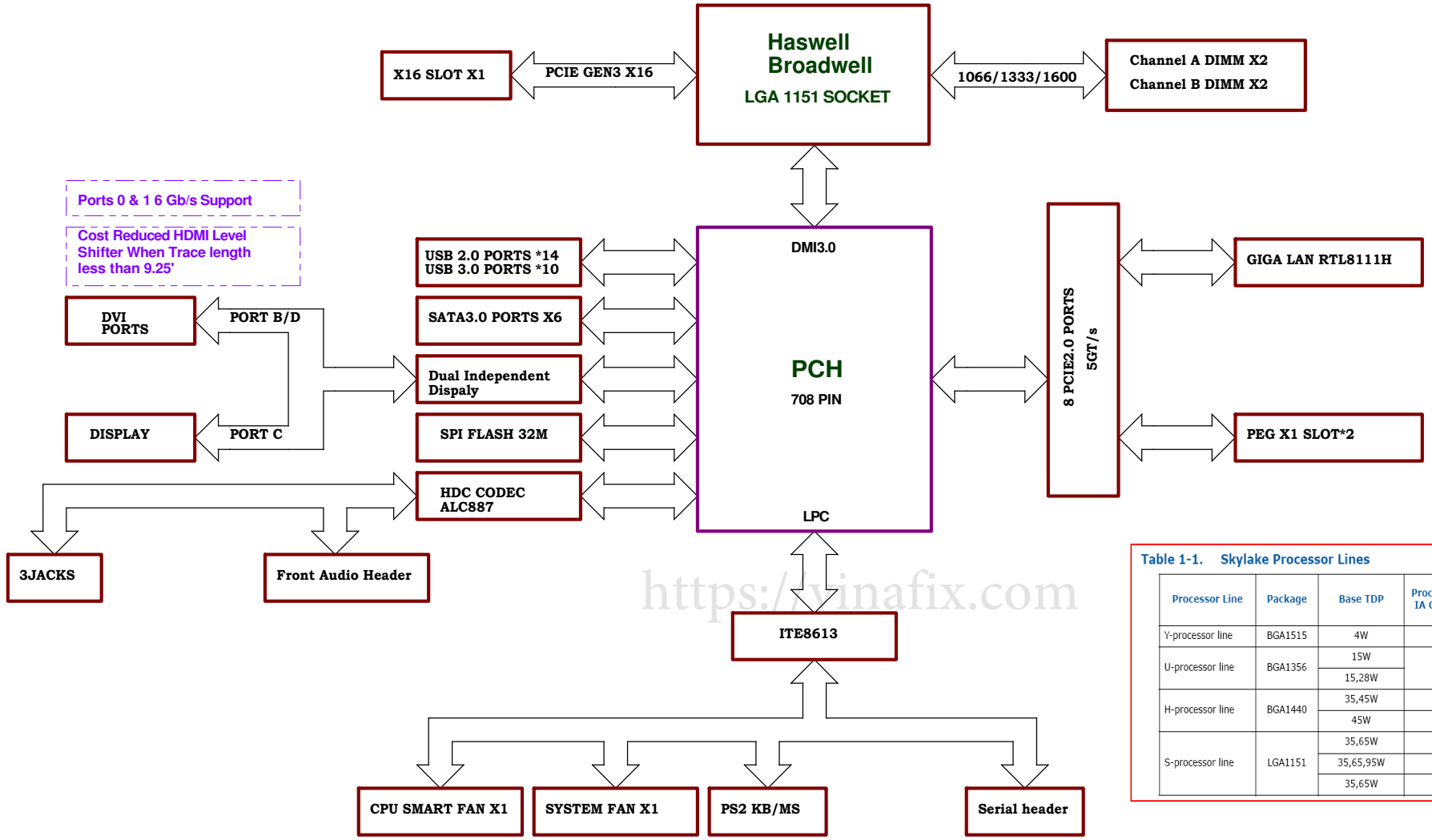




Table 1-1. Skylake Processor Lines

| Processor Line | Package | Base TDP | Processor IA Cores | Maximum Graphics Configuration | On Package Cache | Platform Type |
|---|---|---|---|---|---|---|
| Y-processor line | BGA1515 | 4W | 2 | GT2 | N/A | 1-Chip |
| U-processor line | BGA1356 | 15W | 2 | GT2 | | 1-Chip |
| | | 15,28W | | GT3 | 64 MB | |
| H-processor line | BGA1440 | 35,45W | 4 | GT2 | N/A | 2-Chip |
| | | 45W | 4 | GT4 | 128 MB | |
| S-processor line | LGA1151 | 35,65W | 2 | GT2 | N/A | 2-Chip |
| | | 35,65,95W | 4 | GT2 | | |
| | | 35,65W | 4 | GT4 | 64 MB | |



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Title: BLOCK DIAGRAM

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| | | |
|---|---|---|
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1.VER0.60:REMOVE SATA EXPRESS CONN(PAGE14/16/17/24)

2.VER0.60:REMOVE Hi-Fi FUNCTION(PAGE23/28/29)

3.VER0.60:CHANGE CPU POWER CONN TO 2*2(PAGE39)

4.VER0.60:NEW ADD COLAY FOR V_SA_IO(PAGE38)

5.VER0.6:COST DOWN(POWER_JUSB1 COLAY POWER_JUSB2)(PAGE26)

6.VER0.6:COST DOWN(REMOVE CT6)(PAGE26)

7.VER0.6:COST DOWN(MODIFY F6/GF3 SIZE)(PAGE21/34)

8.VER0.6:COST DOWN(MODIFY MC36 SIZE)(PAGE11)

9.VER0.6:COST DOWN(MCT2/3/CT11 CHANGE TO 560UF)(PAGE31/32)

10.VER0.6:COST DOWN(MC38 /NI)(PAGE11)

11.VER0.6:COST DOWN(YC23 /NI)(PAGE18)

12.VER0.6:COST DOWN(YC16/17/21 /NI)(PAGE18)

13.VER0.6:COST DOWN(LC18/MC5/6 CHANGE TO 10UF 0603 SIZE)(PAGE11/27)

14.VER0.6:COST DOWN(PC155 CHANGE TO 10UF 0603 SIZE)(PAGE39)

15.VER0.6:COST DOWN(C165/MC9 CHANGE TO 1UF 0805 SIZE)(PAGE31/38)

16.VER0.6:COST DOWN(YC11/26 /NI)(PAGE18)

17.VER0.6:COST DOWN(CHANGE TO RN 8P4R)(PAGE17)

18.VER0.6:ATXPG MODIFY(PAGE23/36)

19.VER0.6:COST DOWN(PAGE33)

20.VER0.6:COST DOWN(2N7002 CHANGE TO 2N3904)(PAGE30/33/39)

21.VER0.6:COST DOWN(SHORT 0402)(PAGE8/11/12/16/19/23/33/39)

22.VER0.6:COST DOWN(SHORT 0805)(PAGE18/37/39/40)

23.VER0.6:COST DOWN(BEAD COLAY)(PAGE29)

24.VER0.6:COST DOWN(CPU PWM CHANHE TO RT3606)(PAGE39/40/41)

25.VER0.6:COST DOWN(POWER_JUSB4/POWER_JUSB5 COLAY)(PAGE25/34)

26.VER0.6:MIC MODIFY BY KEVIN(PAGE28)

27.VER0.6:ACPI MODIFY BY KEVIN(PAGE30)

28.VER0.6:IO MODIFY BY KEVIN(PAGE23/27)

29.VER0.6:V_SA_IO MODIFY BY KEVIN(PAGE38)

30.VER0.65:PCIECLKRQ2# MODIFY(PAGE17)

31.VER0.65:PU1 core power change to +12V(PAGE39)

32.VER0.65:SET2_3606 MODIFY(PAGE39)

33.VER0.65:PWM FAE MODIFY(PAGE40/41)

34.VER0.65:IO MODIFY BY PETER(PAGE23)

35.VER0.65:DDR4_DRAMRST_N MODIFY BY PETER(PAGE11)

36.VER0.65:NEW ADD SATA CONN(PAGE14/24)

37.VER0.65:NEW ADD 100UF COLAY CAP(PAGE30/31/32)

38.VER6.0:NEW ADD 100UF AUDIO CAP(PAGE28)





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Title: CHANGELIST

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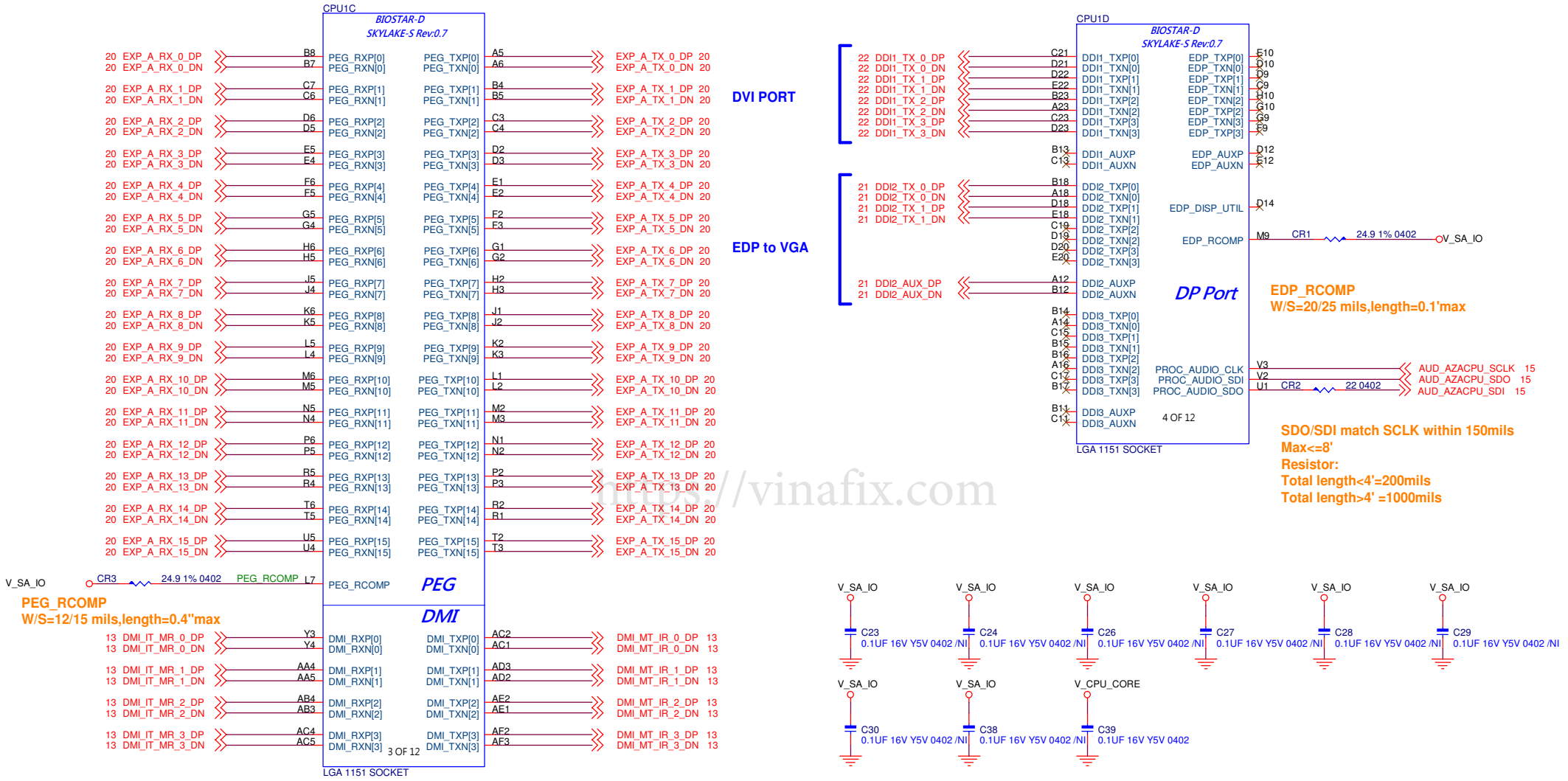








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Title: CPU PCIEX16/DMI/FDI

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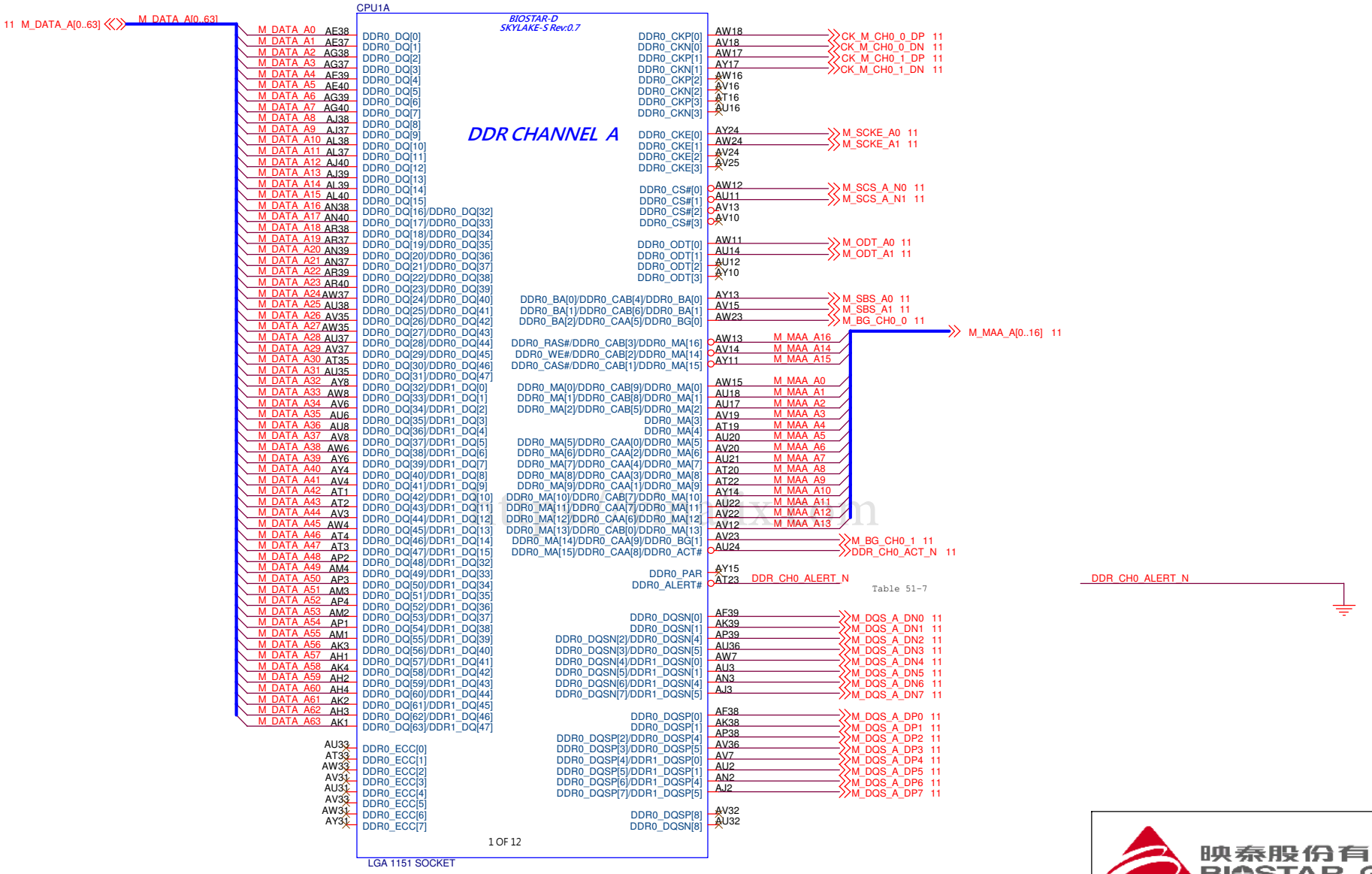


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| | | |
|---|---|---|
| Title | CPU DDR3 CHANNEL A | |
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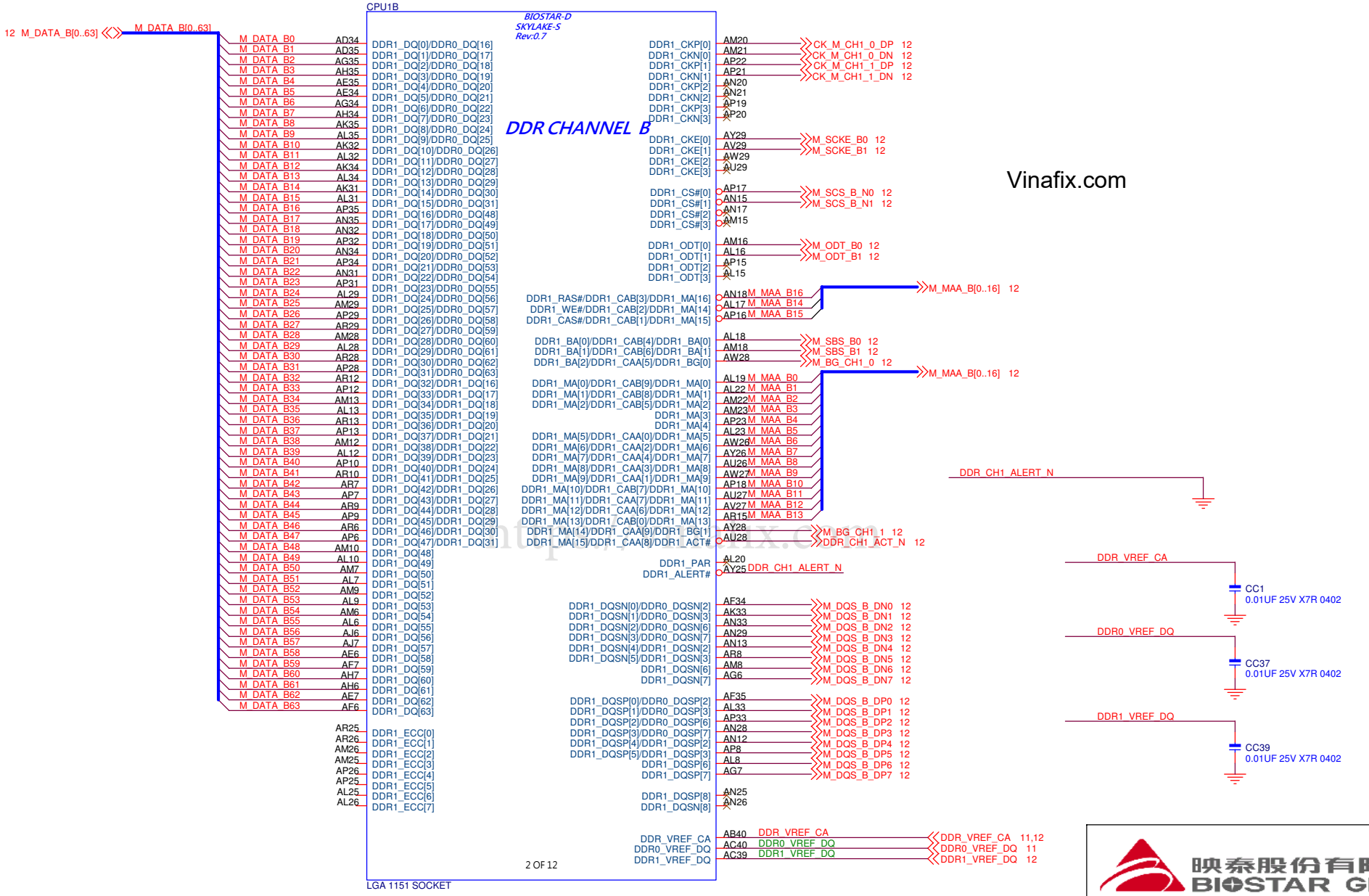
CPU1B
BIOSTAR-D
SKYLAKE-S
Rev:0.7
DDR CHANNEL B
12 M_DATA_B[0..63]
M_DATA_B[0..63]
DDR1_DQ[0]/DDR0_DQ[16]
DDR1_DQ[1]/DDR0_DQ[17]
DDR1_DQ[2]/DDR0_DQ[18]
DDR1_DQ[3]/DDR0_DQ[19]
DDR1_DQ[4]/DDR0_DQ[20]
DDR1_DQ[5]/DDR0_DQ[21]
DDR1_DQ[6]/DDR0_DQ[22]
DDR1_DQ[7]/DDR0_DQ[23]
DDR1_DQ[8]/DDR0_DQ[24]
DDR1_DQ[9]/DDR0_DQ[25]
DDR1_DQ[10]/DDR0_DQ[26]
DDR1_DQ[11]/DDR0_DQ[27]
DDR1_DQ[12]/DDR0_DQ[28]
DDR1_DQ[13]/DDR0_DQ[29]
DDR1_DQ[14]/DDR0_DQ[30]
DDR1_DQ[15]/DDR0_DQ[31]
DDR1_DQ[16]/DDR0_DQ[48]
DDR1_DQ[17]/DDR0_DQ[49]
DDR1_DQ[18]/DDR0_DQ[50]
DDR1_DQ[19]/DDR0_DQ[51]
DDR1_DQ[20]/DDR0_DQ[52]
DDR1_DQ[21]/DDR0_DQ[53]
DDR1_DQ[22]/DDR0_DQ[54]
DDR1_DQ[23]/DDR0_DQ[55]
DDR1_DQ[24]/DDR0_DQ[56]
DDR1_DQ[25]/DDR0_DQ[57]
DDR1_DQ[26]/DDR0_DQ[58]
DDR1_DQ[27]/DDR0_DQ[59]
DDR1_DQ[28]/DDR0_DQ[60]
DDR1_DQ[29]/DDR0_DQ[61]
DDR1_DQ[30]/DDR0_DQ[62]
DDR1_DQ[31]/DDR0_DQ[63]
DDR1_DQ[32]/DDR1_DQ[16]
DDR1_DQ[33]/DDR1_DQ[17]
DDR1_DQ[34]/DDR1_DQ[18]
DDR1_DQ[35]/DDR1_DQ[19]
DDR1_DQ[36]/DDR1_DQ[20]
DDR1_DQ[37]/DDR1_DQ[21]
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DDR1_DQ[39]/DDR1_DQ[23]
DDR1_DQ[40]/DDR1_DQ[24]
DDR1_DQ[41]/DDR1_DQ[25]
DDR1_DQ[42]/DDR1_DQ[26]
DDR1_DQ[43]/DDR1_DQ[27]
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DDR1_DQ[59]
DDR1_DQ[60]
DDR1_DQ[61]
DDR1_DQ[62]
DDR1_DQ[63]
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DDR1_ECC[2]
DDR1_ECC[3]
DDR1_ECC[4]
DDR1_ECC[5]
DDR1_ECC[6]
DDR1_ECC[7]
DDR1_CKP[0]
DDR1_CKN[0]
DDR1_CKP[1]
DDR1_CKN[1]
DDR1_CKP[2]
DDR1_CKN[2]
DDR1_CKP[3]
DDR1_CKN[3]
CK_M_CH1_0_DP 12
CK_M_CH1_0_DN 12
CK_M_CH1_1_DP 12
CK_M_CH1_1_DN 12
DDR1_CKE[0]
DDR1_CKE[1]
DDR1_CKE[2]
DDR1_CKE[3]
M_SCKE_B0 12
M_SCKE_B1 12
DDR1_CS#[0]
DDR1_CS#[1]
DDR1_CS#[2]
DDR1_CS#[3]
M_SCS_B_N0 12
M_SCS_B_N1 12
DDR1_ODT[0]
DDR1_ODT[1]
DDR1_ODT[2]
DDR1_ODT[3]
M_ODT_B0 12
M_ODT_B1 12
DDR1_RAS#/DDR1_CAB[3]/DDR1_MA[16]
DDR1_WE#/DDR1_CAB[2]/DDR1_MA[14]
DDR1_CAS#/DDR1_CAB[1]/DDR1_MA[15]
M_MAA_B16
M_MAA_B14
M_MAA_B15
M_MAA_B[0..16] 12
DDR1_BA[0]/DDR1_CAB[4]/DDR1_BA[0]
DDR1_BA[1]/DDR1_CAB[6]/DDR1_BA[1]
DDR1_BA[2]/DDR1_CAA[5]/DDR1_BG[0]
M_SBS_B0 12
M_SBS_B1 12
M_BG_CH1_0 12
DDR1_MA[0]/DDR1_CAB[9]/DDR1_MA[0]
DDR1_MA[1]/DDR1_CAB[8]/DDR1_MA[1]
DDR1_MA[2]/DDR1_CAB[5]/DDR1_MA[2]
DDR1_MA[3]
DDR1_MA[4]
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DDR1_MA[13]/DDR1_CAB[0]/DDR1_MA[13]
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M_MAA_B8
M_MAA_B9
M_MAA_B10
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M_MAA_B13
M_MAA_B[0..16] 12
M_BG_CH1_1 12
DDR_CH1_ACT_N 12
DDR1_PAR
DDR1_ALERT#
DDR_CH1_ALERT_N
DDR_CH1_ALERT_N
DDR_VREF_CA
DDR0_VREF_DQ
DDR1_VREF_DQ
DDR_VREF_CA 11,12
DDR0_VREF_DQ 11
DDR1_VREF_DQ 12
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DDR1_DQSN[5]/DDR1_DQSN[3]
DDR1_DQSN[6]
DDR1_DQSN[7]
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M_DQS_B_DN1 12
M_DQS_B_DN2 12
M_DQS_B_DN3 12
M_DQS_B_DN4 12
M_DQS_B_DN5 12
M_DQS_B_DN6 12
M_DQS_B_DN7 12
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DDR1_DQSP[1]/DDR0_DQSP[3]
DDR1_DQSP[2]/DDR0_DQSP[6]
DDR1_DQSP[3]/DDR0_DQSP[7]
DDR1_DQSP[4]/DDR1_DQSP[2]
DDR1_DQSP[5]/DDR1_DQSP[3]
DDR1_DQSP[6]
DDR1_DQSP[7]
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M_DQS_B_DP2 12
M_DQS_B_DP3 12
M_DQS_B_DP4 12
M_DQS_B_DP5 12
M_DQS_B_DP6 12
M_DQS_B_DP7 12
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DDR1_DQSN[8]
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LGA 1151 SOCKET
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DDR_VREF_CA
DDR0_VREF_DQ
DDR0_VREF_DQ
DDR1_VREF_DQ
DDR1_VREF_DQ
CC1
0.01UF 25V X7R 0402
CC37
0.01UF 25V X7R 0402
CC39
0.01UF 25V X7R 0402
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CPU DDR3 CHANNEL B
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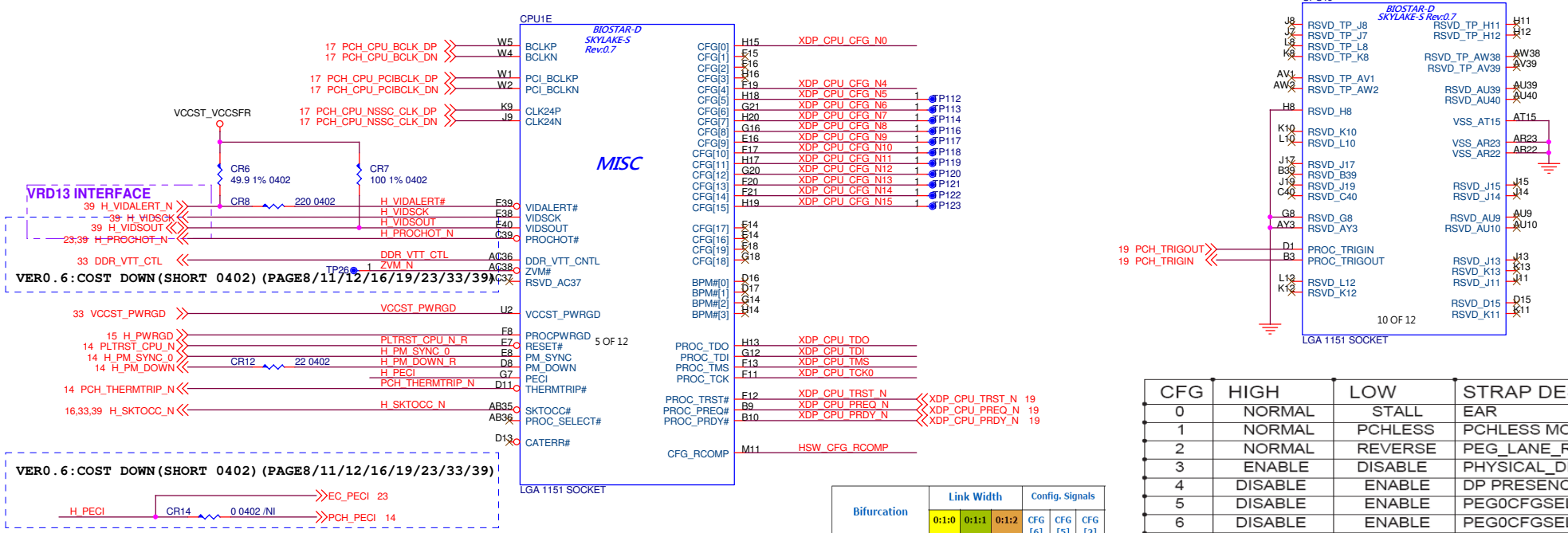
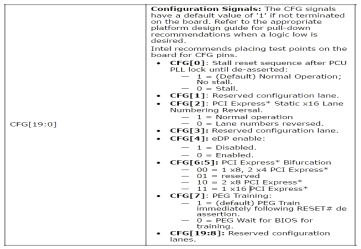






| Bifurcation | Link Width | | | Config. Signals | | |
|---|---|---|---|---|---|---|
| | 0:1:0 | 0:1:1 | 0:1:2 | CFG [6] | CFG [5] | CFG [2] |
| 1x16 | x16 | N/A | N/A | 1 | 1 | 1 |
| 1x16 **Reversed** | x16 | N/A | N/A | 1 | 1 | 0 |
| 2x8 | x8 | x8 | N/A | 1 | 0 | 1 |
| 2x8 **Reversed** | x8 | x8 | N/A | 1 | 0 | 0 |
| 1x8+2x4 | x8 | x4 | x4 | 0 | 0 | 1 |
| 1x8+2x4 **Reversed** | x8 | x4 | x4 | 0 | 0 | 0 |




| CFG | HIGH | LOW | STRAP DESCRIPTION |
|---|---|---|---|
| 0 | NORMAL | STALL | EAR |
| 1 | NORMAL | PCHLESS | PCHLESS MODE |
| 2 | NORMAL | REVERSE | PEG_LANE_REVERSAL |
| 3 | ENABLE | DISABLE | PHYSICAL_DEBUG_ENABLE |
| 4 | DISABLE | ENABLE | DP PRESENCE |
| 5 | DISABLE | ENABLE | PEG0CFGSEL[0] |
| 6 | DISABLE | ENABLE | PEG0CFGSEL[1] |
| 7 | RESET_N | BIOS REQ | PEG_DEFER_TRAINING |
| 8 | DISABLE | ENABLE | CFG UNLOCK |
| 9 | PRESENT | NOT PRESENT | SVID NOT PRESENT |
| 10 | ACTIVATE | DEACTIVATE | SAFE MODE BOOT |
| 11 | DC COUPLED | AC COUPLED | DMI_AC_COUPLED |
| 12 | PMSYNC 2.0 | LEGACY | PMSYNC LEGACY |
| 13 | SYNC | ASYNC | PMSYNC ASYNC MODE |
| 14 | RESERVED | | |
| 15 | RESERVED | | |
| ALL PINS HAVE INTERNAL PULL-UPS | | | |

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| | | |
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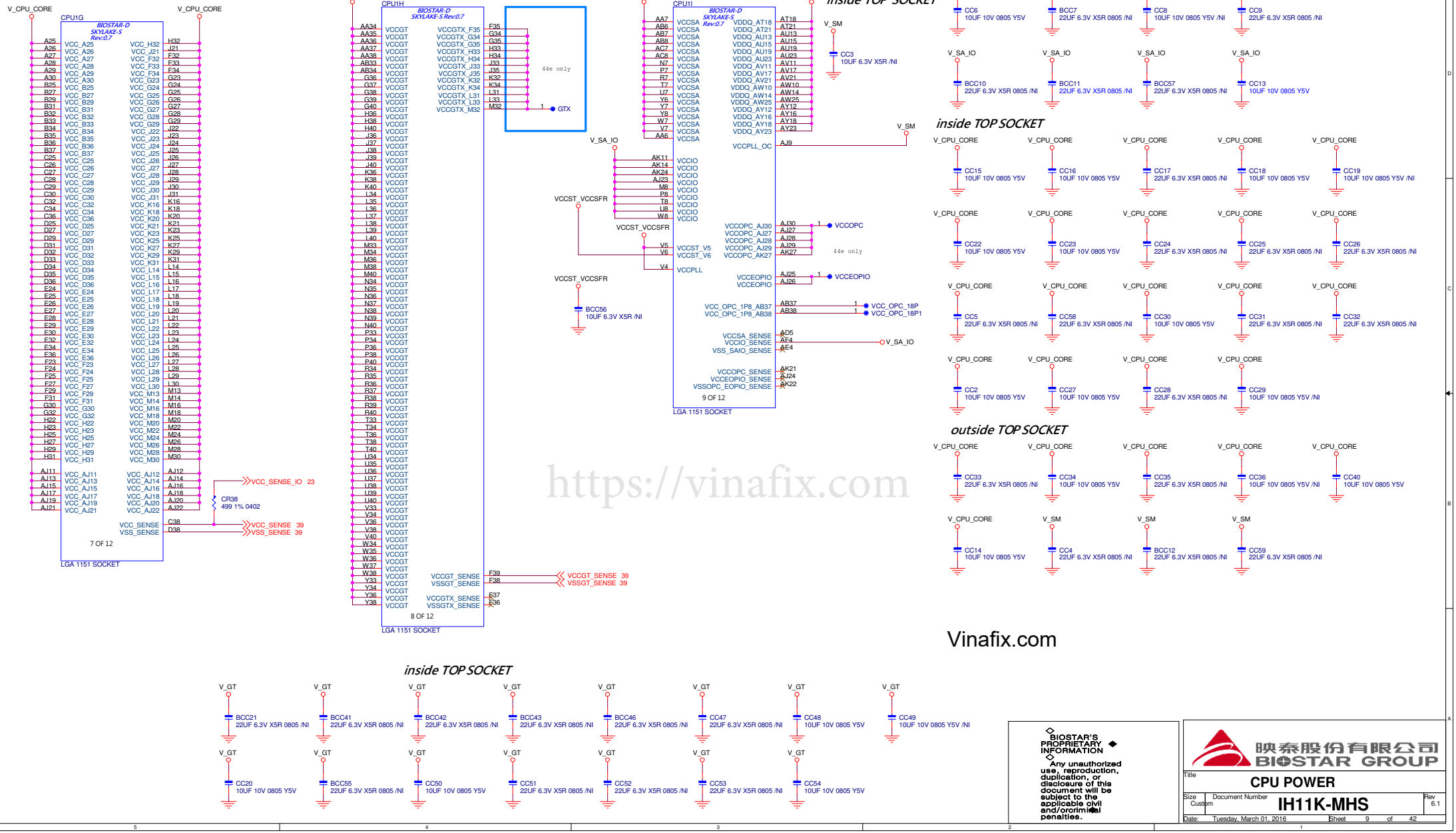




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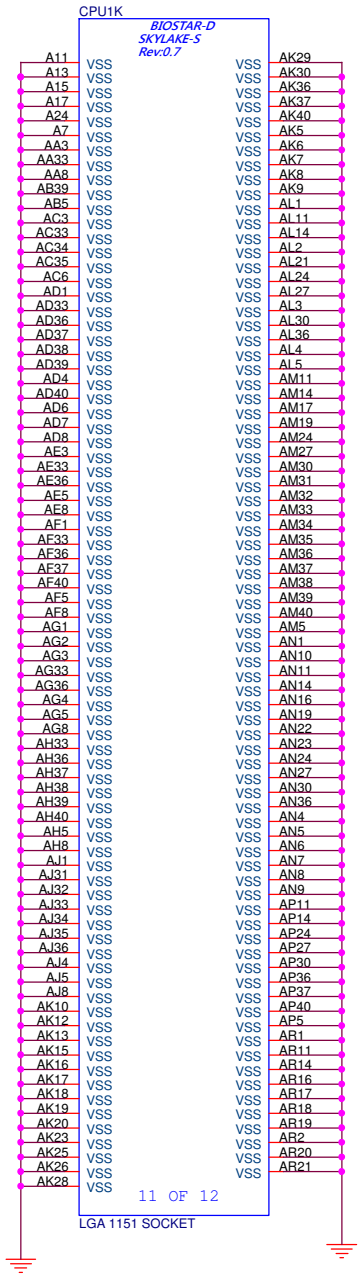


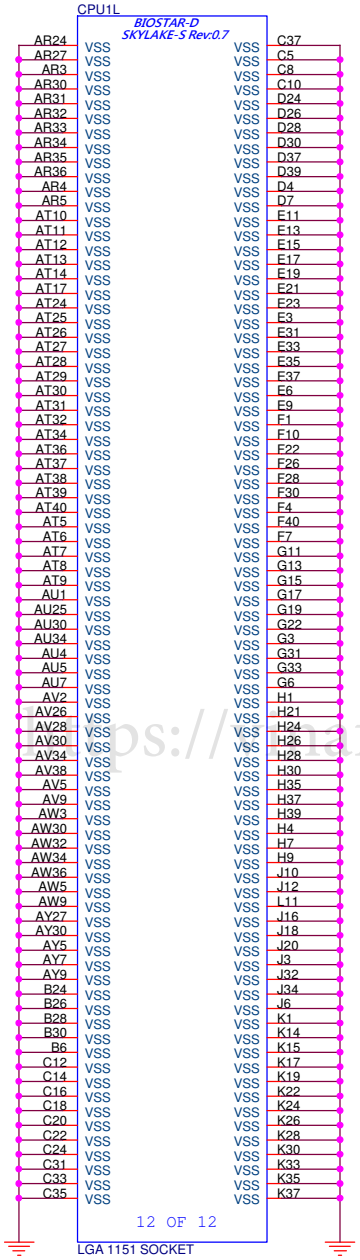


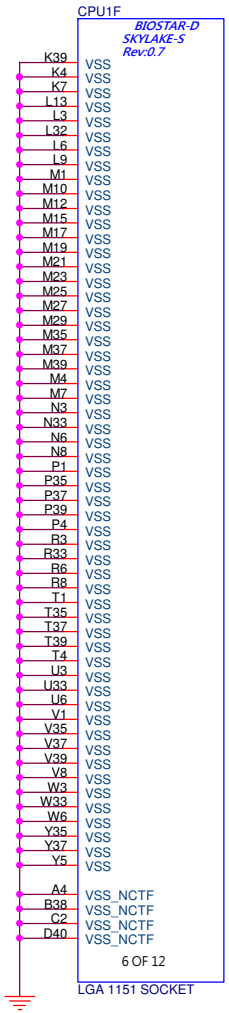




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Title: CPU GND

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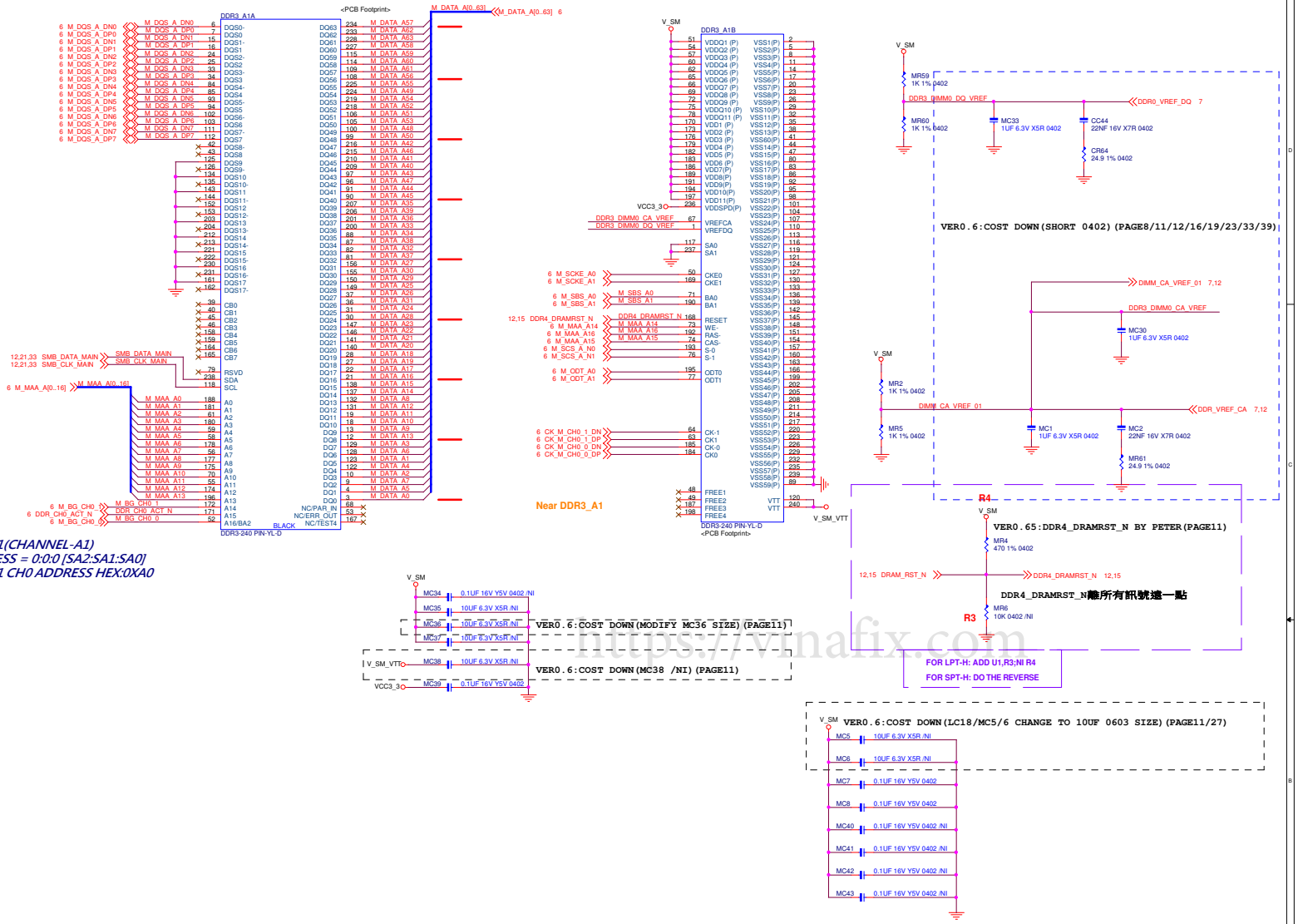




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| | | |
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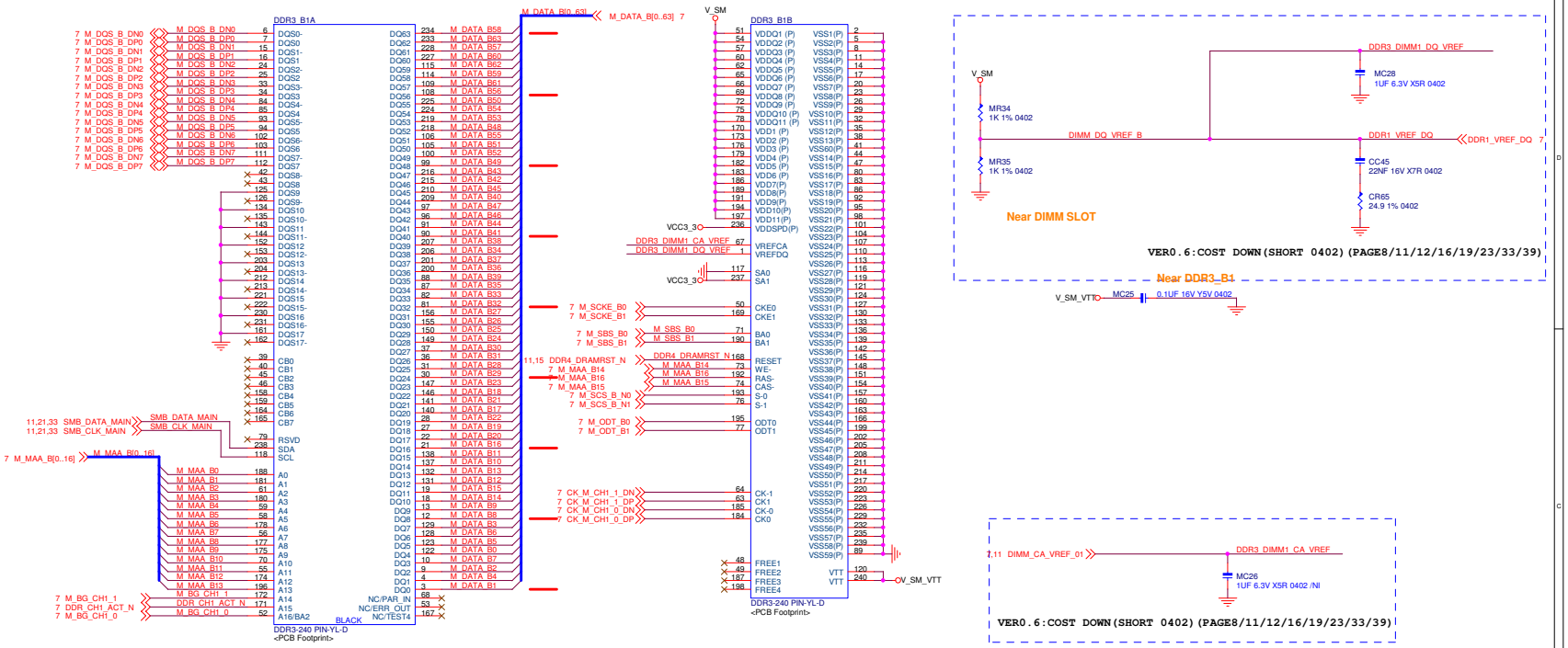






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Title: DDR3L DIMMB1

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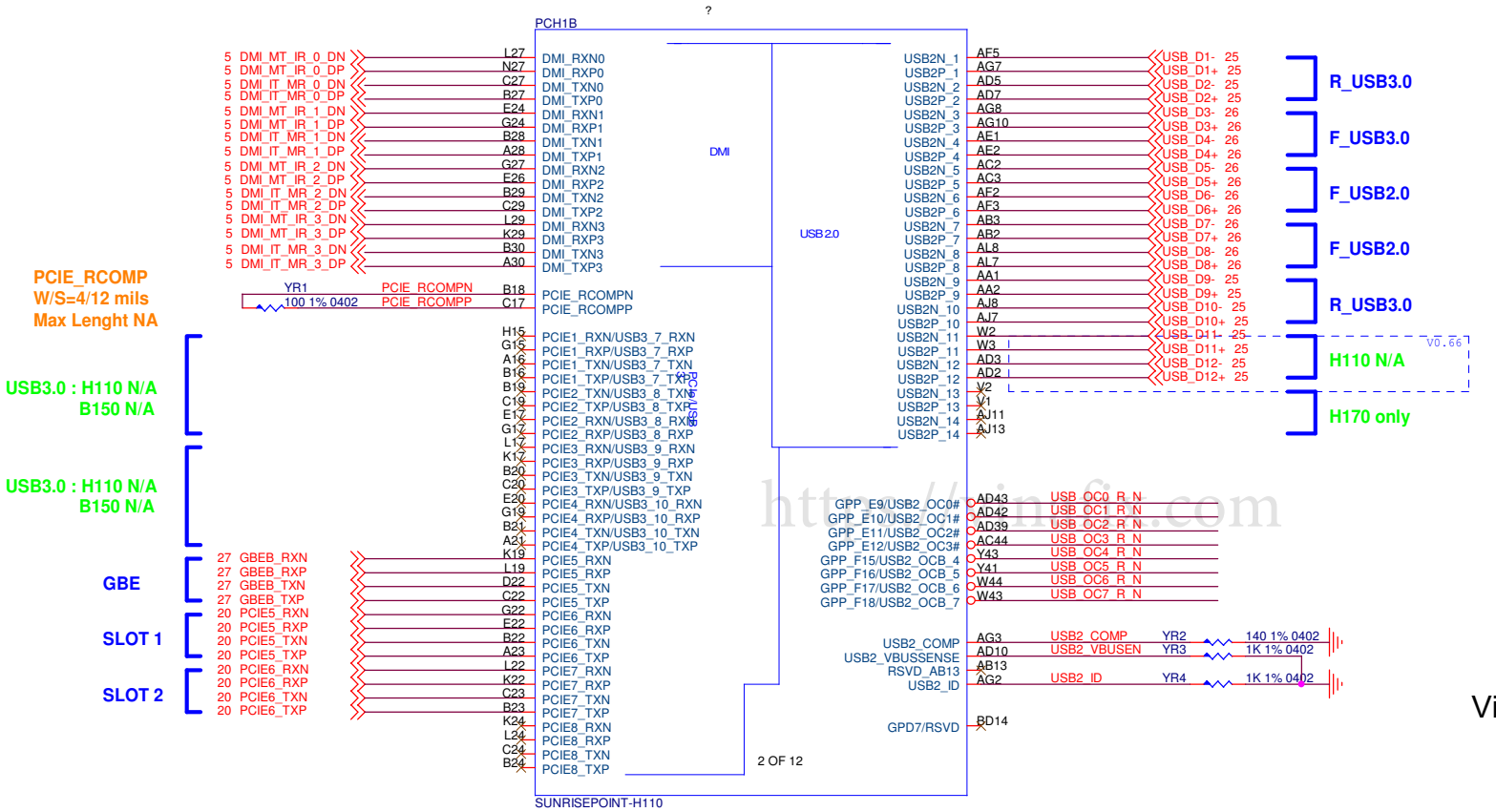
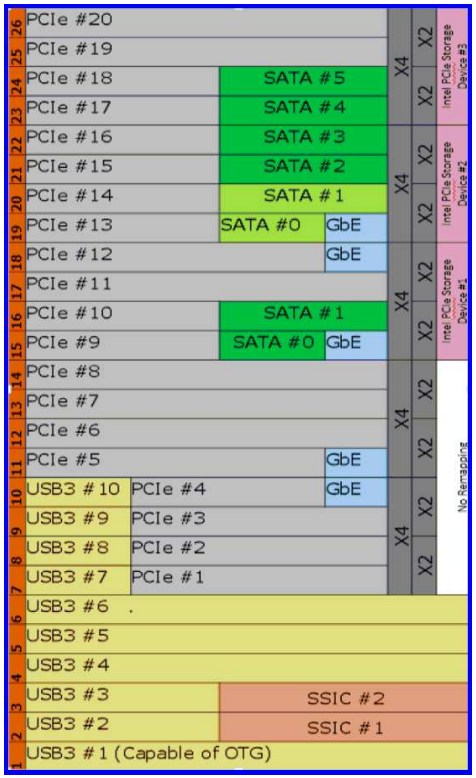
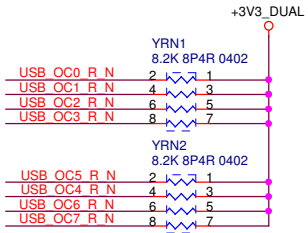
# PCH PART: Y+Reference

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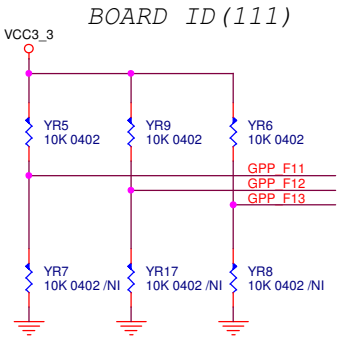
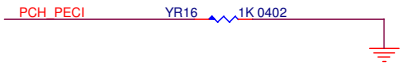
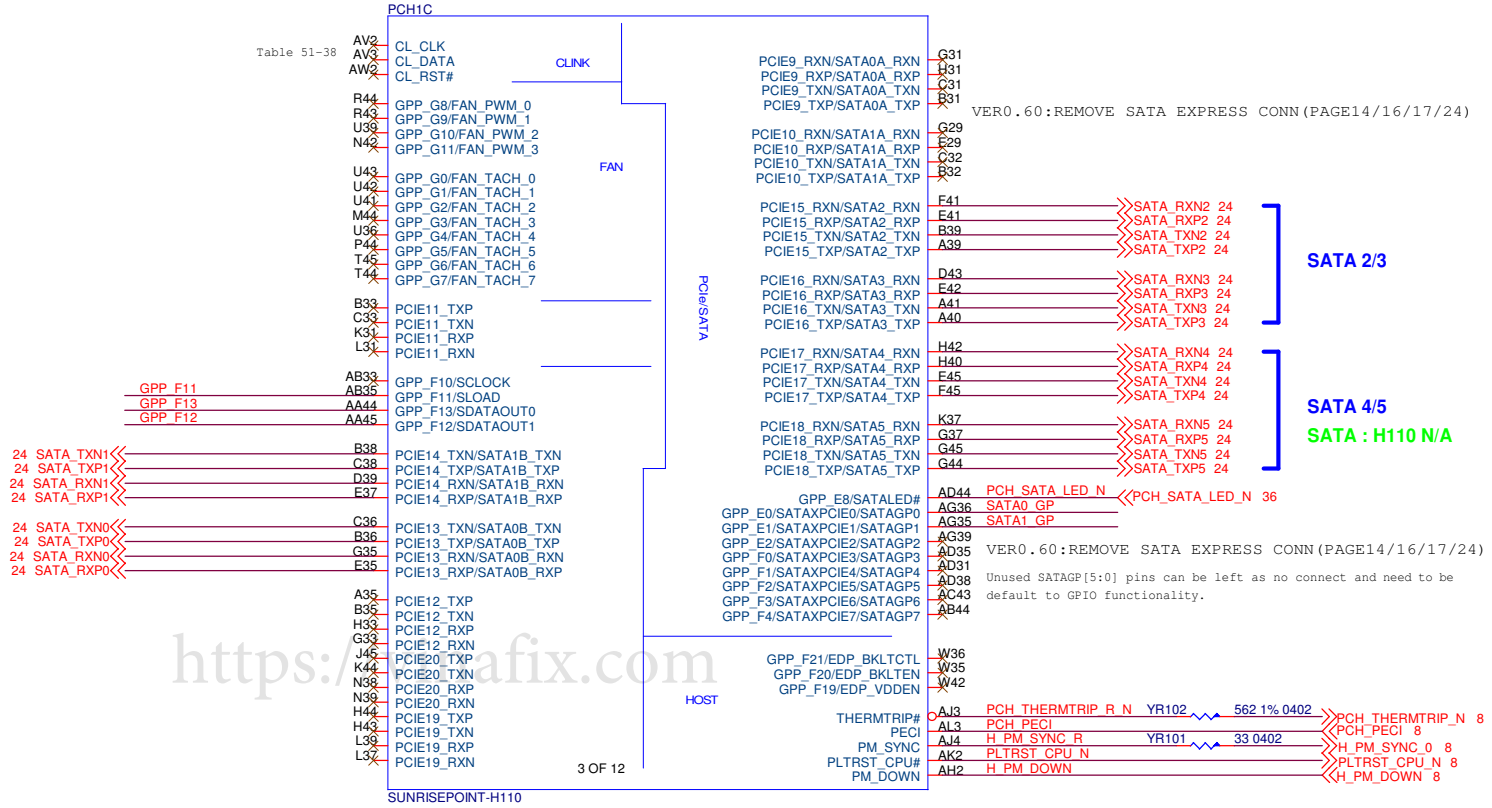
| | | |
|---|---|---|
| 映泰股份有限公司 BIOSTAR GROUP | | |
| Title | PCH DMI/PCIE/USB | |
| Size B | Document Number IH11K-MHS | Rev 6.1 |
| Date: Tuesday, March 01, 2016 | Sheet 13 of 42 | |

# PCH PART: Y+Reference








**GbE can be mapped into one of the PCIe Ports 4-5, Port 9, and Ports 12-13.**



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Title: PCH CLINK/SATA/CPU HOST

Size: B | Document Number: IH11K-MHS | Rev: 6.1

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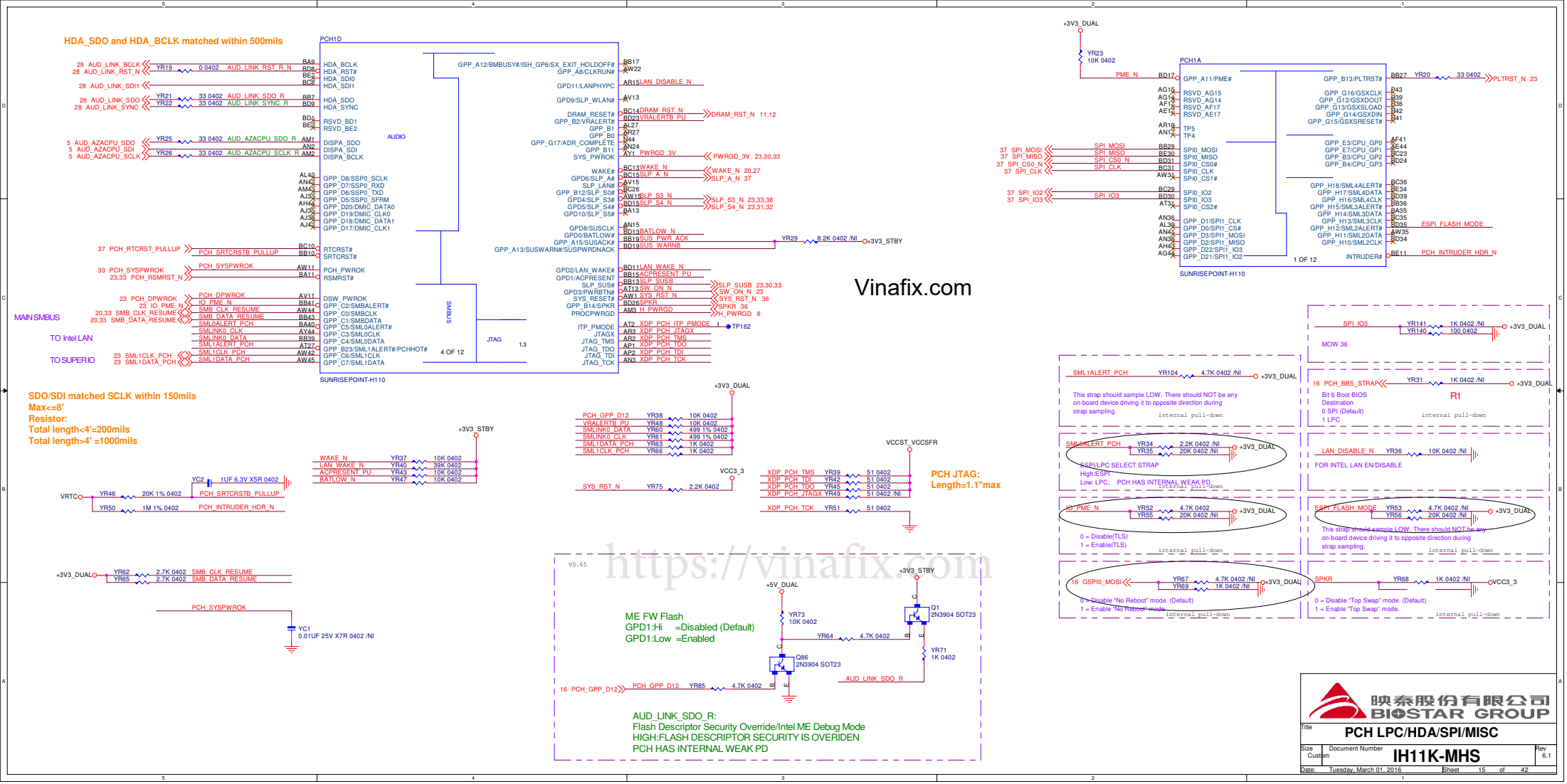
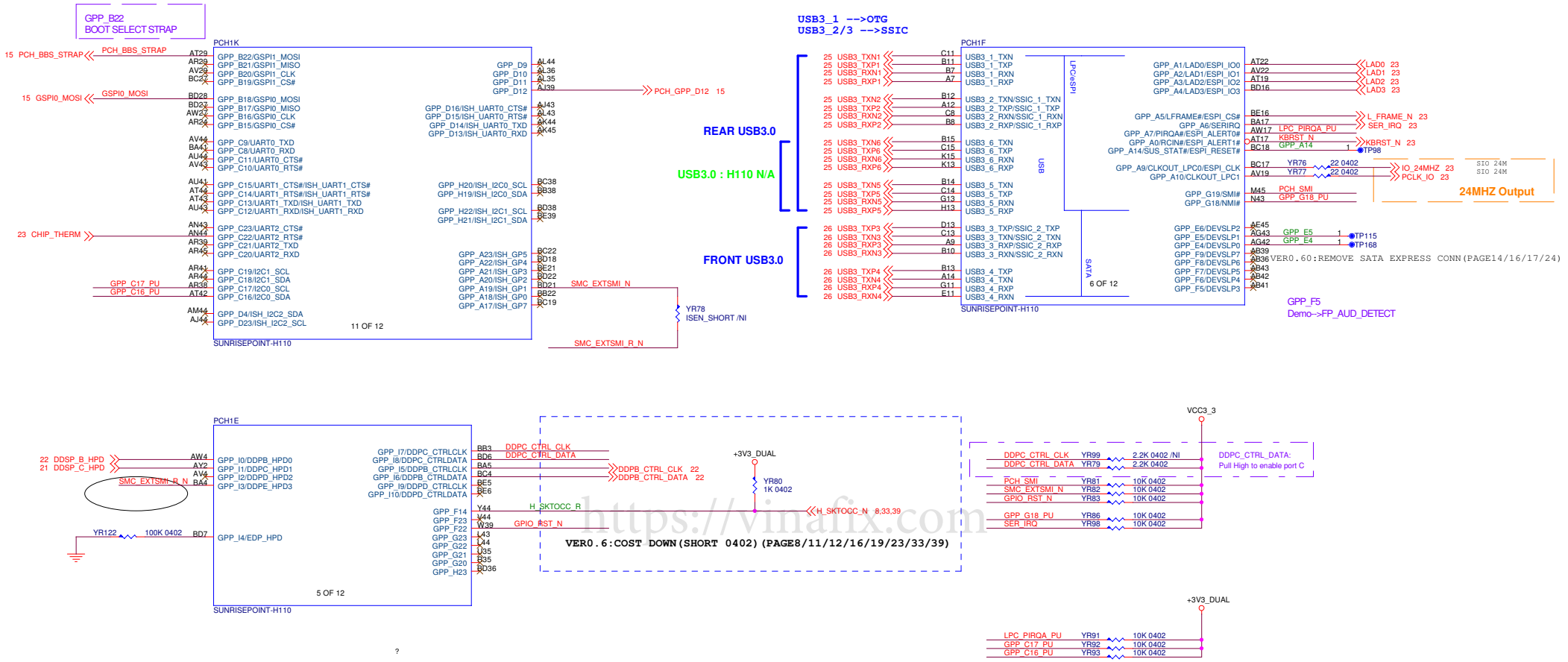

HDA_SDO and HDA_BCLK matched within 500mils
PCH1D
SUNRISEPOINT-H110
4 OF 12
AUDIO
SMBUS
JTAG
MAIN SMBUS
TO Intel LAN
TO SUPERIO
SDO/SDI matched SCLK within 150mils
Max<=8'
Resistor:
Total length<4'=200mils
Total length>4' =1000mils
PCH JTAG:
Length=1.1"max
Vinafix.com
https://vinafix.com
ME FW Flash
GPD1:Hi =Disabled (Default)
GPD1:Low =Enabled
AUD_LINK_SDO_R:
Flash Descriptor Security Override/Intel ME Debug Mode
HIGH:FLASH DESCRIPTOR SECURITY IS OVERIDEN
PCH HAS INTERNAL WEAK PD
PCH1A
SUNRISEPOINT-H110
1 OF 12
This strap should sample LOW. There should NOT be any on-board device driving it to opposite direction during strap sampling.
Bit 6 Boot BIOS Destination
0 SPI (Default)
1 LPC
ESPI/LPC SELECT STRAP
High:ESPI
Low: LPC; PCH HAS INTERNAL WEAK PD
0 = Disable(TLS)
1 = Enable(TLS)
0 = Disable "No Reboot" mode. (Default)
1 = Enable "No Reboot" mode.
0 = Disable "Top Swap" mode. (Default)
1 = Enable "Top Swap" mode.
MOW 36
FOR INTEL LAN EN/DISABLE
R1
BIOSTAR GROUP
PCH LPC/HDA/SPI/MISC
IH11K-MHS
Tuesday, March 01, 2016

# PCH PART: Y+Reference





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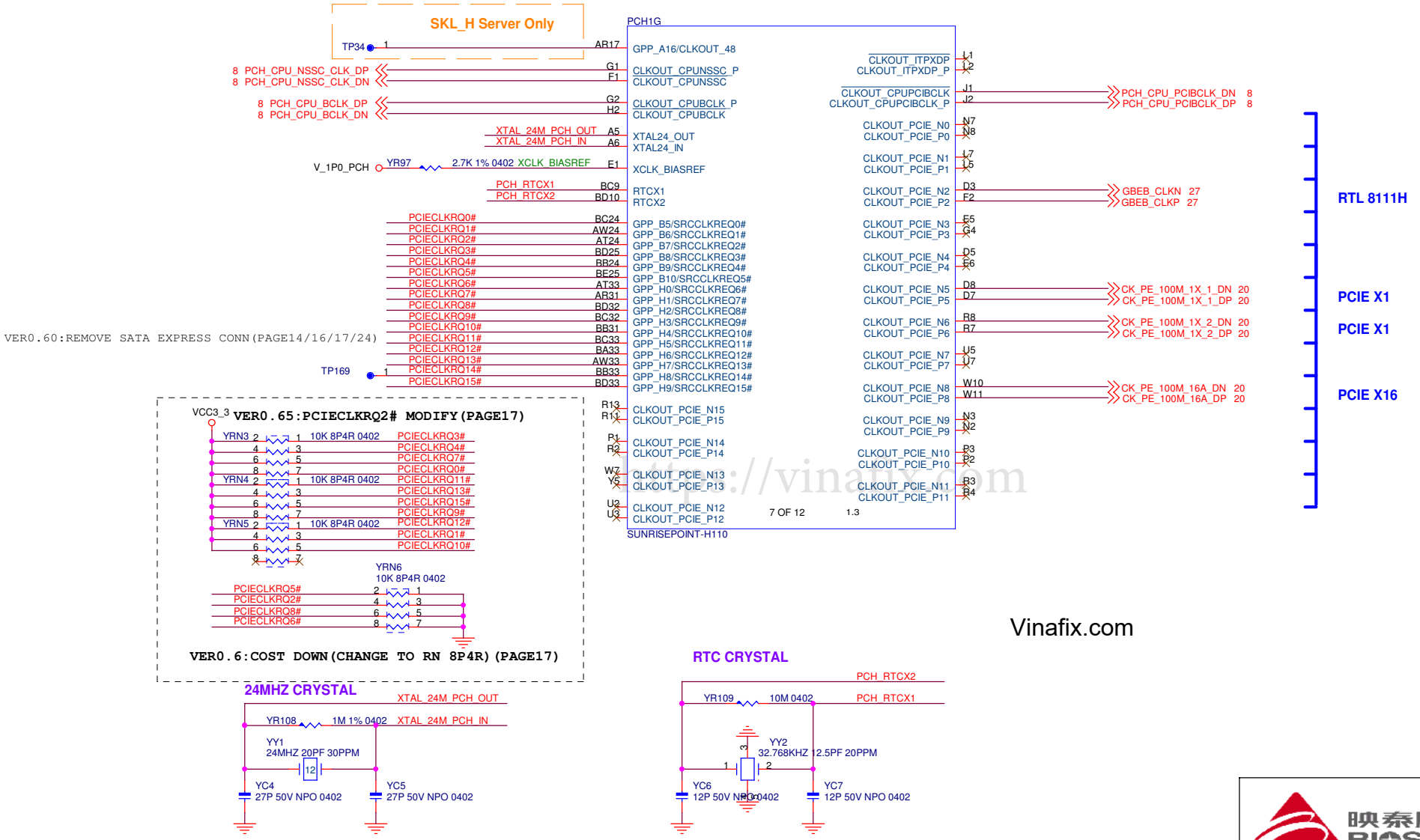
| | | |
|---|---|---|
| Title | PCH LPC/DP/USB3/UART | |
| Size: Custom | Document Number: IH11K-MHS | Rev: 6.1 |
| Date: Tuesday, March 01, 2016 | Sheet 16 of 42 | |



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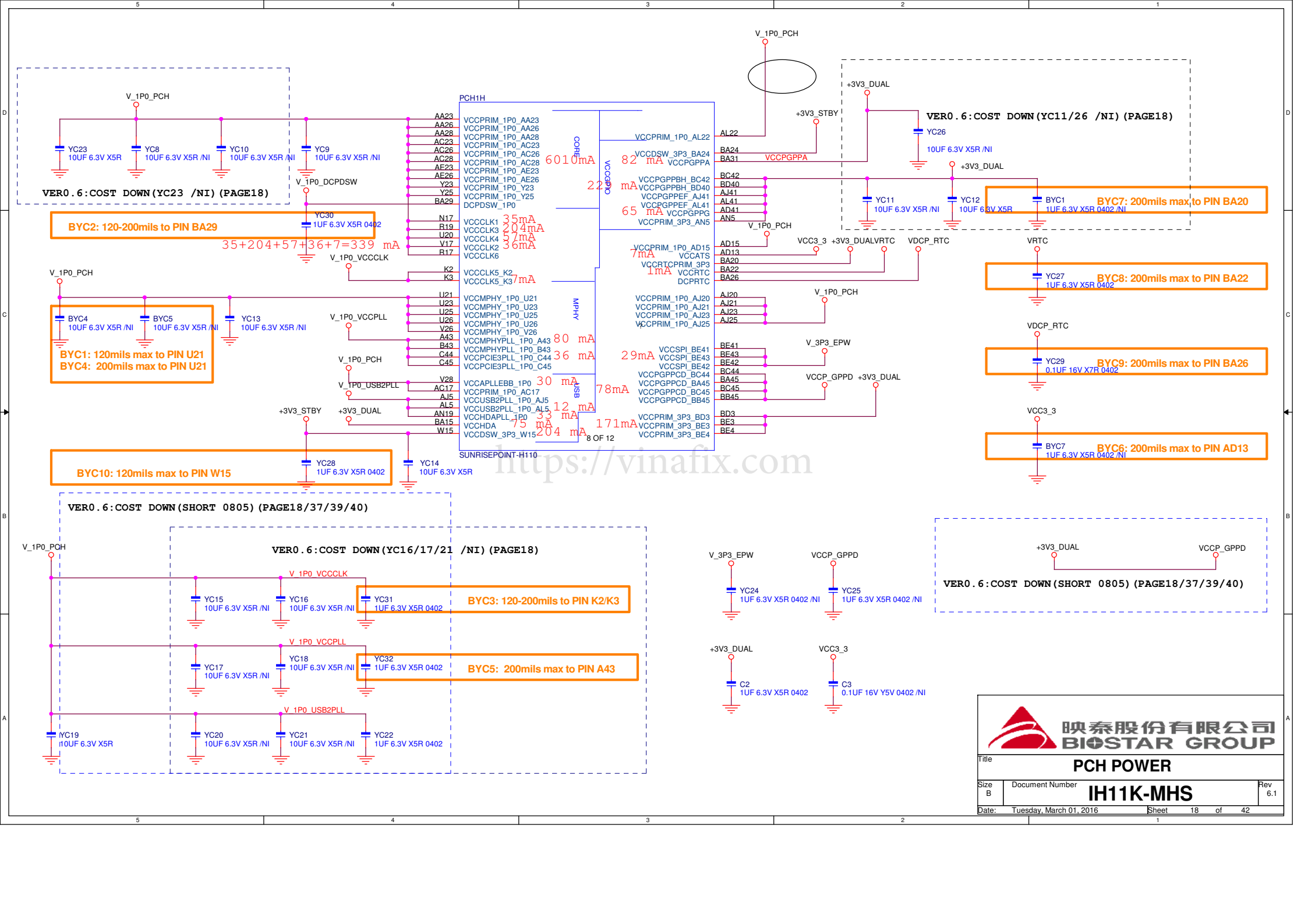
| | | |
|---|---|---|
| Title | PCH CLOCK BUFFER | |
| Size B | Document Number IH11K-MHS | Rev 6.1 |
| Date: Tuesday, March 01, 2016 | Sheet 17 of 42 | |


V_1P0_PCH
YC23 10UF 6.3V X5R
YC8 10UF 6.3V X5R /NI
YC10 10UF 6.3V X5R /NI
YC9 10UF 6.3V X5R /NI
VER0.6:COST DOWN(YC23 /NI)(PAGE18)
V_1P0_DCPDSW
YC30 1UF 6.3V X5R 0402
BYC2: 120-200mils to PIN BA29
35+204+57+36+7=339 mA
V_1P0_VCCCLK
PCH1H
AA23 VCCPRIM_1P0_AA23
AA26 VCCPRIM_1P0_AA26
AA28 VCCPRIM_1P0_AA28
AC23 VCCPRIM_1P0_AC23
AC26 VCCPRIM_1P0_AC26
AC28 VCCPRIM_1P0_AC28
AE23 VCCPRIM_1P0_AE23
AE26 VCCPRIM_1P0_AE26
Y23 VCCPRIM_1P0_Y23
Y25 VCCPRIM_1P0_Y25
BA29 DCPDSW_1P0
CORE
6010mA
VCCOPC
N17 VCCCLK1 35mA
R19 VCCCLK3 204mA
U20 VCCCLK4 57mA
V17 VCCCLK2 36mA
R17 VCCCLK6
K2 VCCCLK5_K2
K3 VCCCLK5_K3 7mA
V_1P0_PCH
BYC4 10UF 6.3V X5R /NI
BYC5 10UF 6.3V X5R /NI
YC13 10UF 6.3V X5R /NI
BYC1: 120mils max to PIN U21
BYC4: 200mils max to PIN U21
V_1P0_VCCPLL
U21 VCCMPHY_1P0_U21
U23 VCCMPHY_1P0_U23
U25 VCCMPHY_1P0_U25
U26 VCCMPHY_1P0_U26
V26 VCCMPHY_1P0_V26
A43 VCCMPHYPLL_1P0_A43 80 mA
B43 VCCMPHYPLL_1P0_B43
C44 VCCPCIE3PLL_1P0_C44 36 mA
C45 VCCPCIE3PLL_1P0_C45
MPHY
V_1P0_PCH
V_1P0_USB2PLL
V28 VCCAPLLEBB_1P0 30 mA
AC17 VCCPRIM_1P0_AC17
AJ5 VCCUSB2PLL_1P0_AJ5 12 mA
AL5 VCCUSB2PLL_1P0_AL5
AN19 VCCHDAPLL_1P0 33 mA
BA15 VCCHDA 75 mA
W15 VCCDSW_3P3_W15 204 mA
USB
78mA
8 OF 12
+3V3_STBY
+3V3_DUAL
BYC10: 120mils max to PIN W15
YC28 1UF 6.3V X5R 0402
YC14 10UF 6.3V X5R
SUNRISEPOINT-H110
VCCPRIM_1P0_AL22 AL22
VCCDSW_3P3_BA24 BA24
82 mA VCCPGPPA BA31
VCCPGPPA
VCCPGPPBH_BC42 BC42
VCCPGPPBH_BD40 BD40
22 mA VCCPGPPEF_AJ41 AJ41
VCCPGPPEF_AL41 AL41
65 mA VCCPGPPG AD41
VCCPRIM_3P3_AN5 AN5
V_1P0_PCH
VCCPRIM_1P0_AD15 AD15
7mA VCCATS AD13
VCCRTCPRIM_3P3 BA20
1mA VCCRTC BA22
DCPRTC BA26
VCC3_3 +3V3_DUALVRTC VDCP_RTC
VCCPRIM_1P0_AJ20 AJ20
VCCPRIM_1P0_AJ21 AJ21
VCCPRIM_1P0_AJ23 AJ23
VCCPRIM_1P0_AJ25 AJ25
V_1P0_PCH
VCCSPI_BE41 BE41
29mA VCCSPI_BE43 BE43
VCCSPI_BE42 BE42
V_3P3_EPW
VCCPGPPCD_BC44 BC44
VCCPGPPCD_BA45 BA45
VCCPGPPCD_BC45 BC45
VCCPGPPCD_BB45 BB45
VCCP_GPPD +3V3_DUAL
VCCPRIM_3P3_BD3 BD3
171mA VCCPRIM_3P3_BE3 BE3
VCCPRIM_3P3_BE4 BE4
+3V3_DUAL
YC26 10UF 6.3V X5R /NI
VER0.6:COST DOWN(YC11/26 /NI)(PAGE18)
YC11 10UF 6.3V X5R /NI
YC12 10UF 6.3V X5R
BYC1 1UF 6.3V X5R 0402 /NI
BYC7: 200mils max to PIN BA20
VRTC
YC27 1UF 6.3V X5R 0402
BYC8: 200mils max to PIN BA22
VDCP_RTC
YC29 0.1UF 16V X7R 0402
BYC9: 200mils max to PIN BA26
VCC3_3
BYC7 1UF 6.3V X5R 0402 /NI
BYC6: 200mils max to PIN AD13
VER0.6:COST DOWN(SHORT 0805)(PAGE18/37/39/40)
V_1P0_PCH
VER0.6:COST DOWN(YC16/17/21 /NI)(PAGE18)
V_1P0_VCCCLK
YC15 10UF 6.3V X5R /NI
YC16 10UF 6.3V X5R /NI
YC31 1UF 6.3V X5R 0402
BYC3: 120-200mils to PIN K2/K3
V_1P0_VCCPLL
YC17 10UF 6.3V X5R /NI
YC18 10UF 6.3V X5R /NI
YC32 1UF 6.3V X5R 0402
BYC5: 200mils max to PIN A43
V_1P0_USB2PLL
YC19 10UF 6.3V X5R
YC20 10UF 6.3V X5R /NI
YC21 10UF 6.3V X5R /NI
YC22 1UF 6.3V X5R 0402
V_3P3_EPW
YC24 1UF 6.3V X5R 0402 /NI
VCCP_GPPD
YC25 1UF 6.3V X5R 0402 /NI
+3V3_DUAL
C2 1UF 6.3V X5R 0402
VCC3_3
C3 0.1UF 16V Y5V 0402 /NI
+3V3_DUAL
VCCP_GPPD
VER0.6:COST DOWN(SHORT 0805)(PAGE18/37/39/40)
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BIOSTAR GROUP
Title
PCH POWER
Size B
Document Number
IH11K-MHS
Rev 6.1
Date: Tuesday, March 01, 2016
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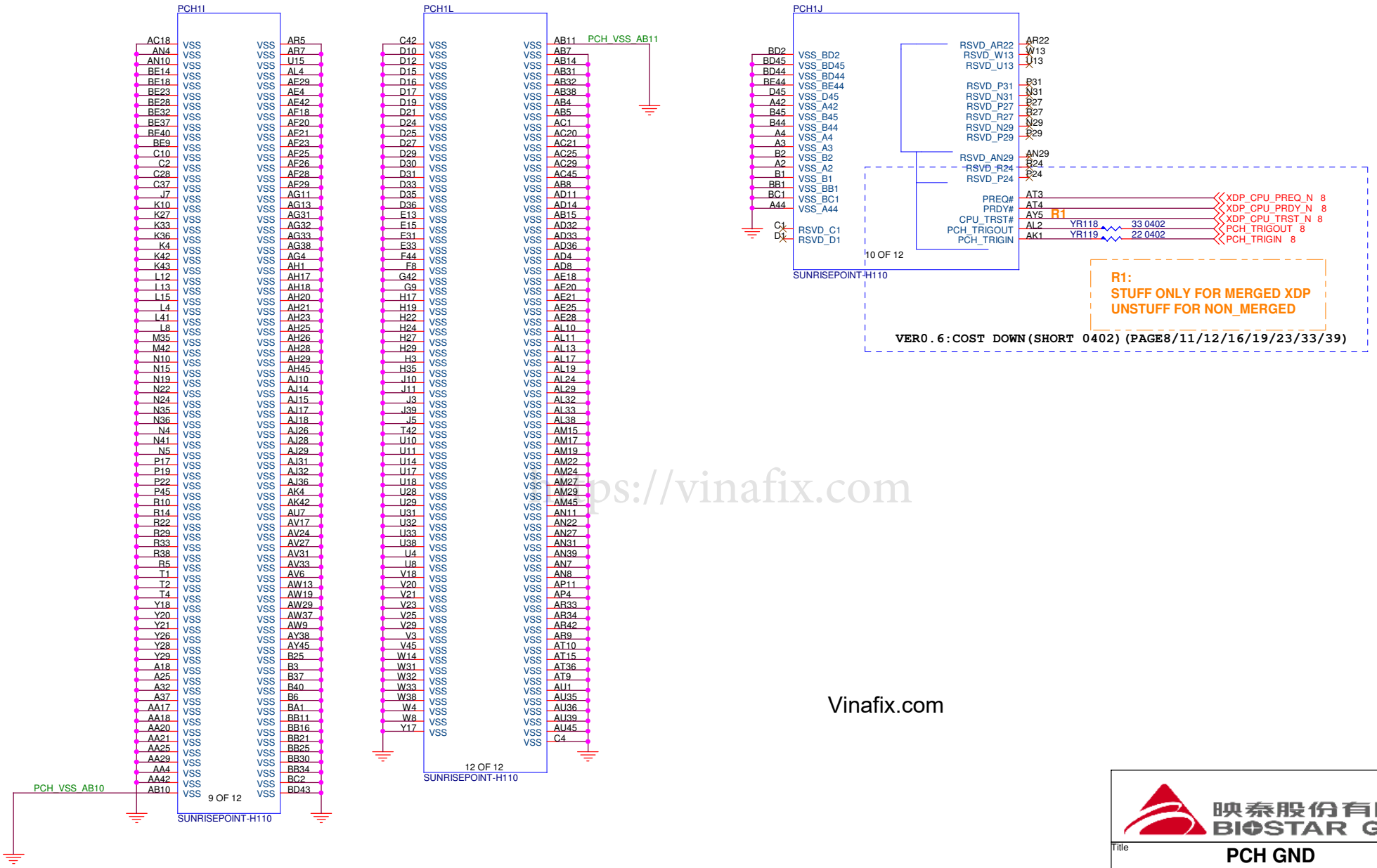




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| | | |
|---|---|---|
| Title | PCH GND | |
| Size B | Document Number IH11K-MHS | Rev 6.1 |
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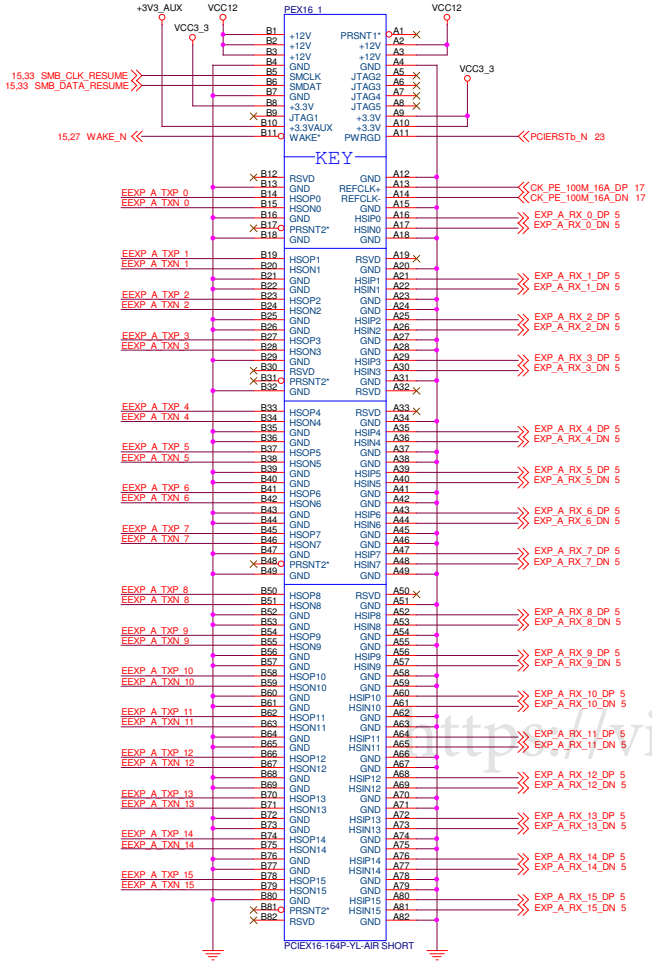
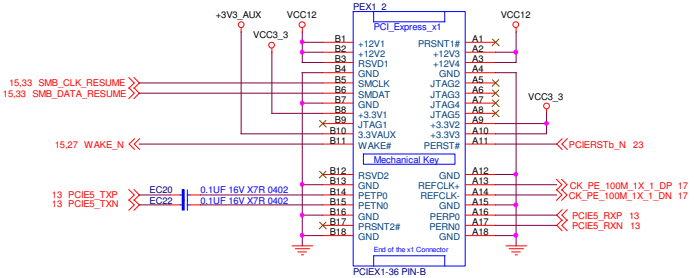
# SLOT PART: E+Reference

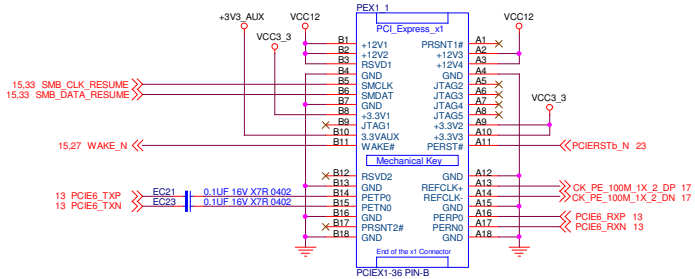
Value:180 nF - 265 nF

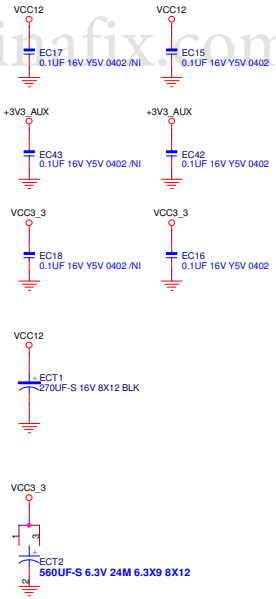
450 mils max to connector pin

| | | | | |
|---|---|---|---|---|
| 5 EXP_A_TX_0_DP | EC1 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_0 | |
| 5 EXP_A_TX_0_DN | EC2 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_0 | |
| 5 EXP_A_TX_1_DP | EC3 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_1 | |
| 5 EXP_A_TX_1_DN | EC4 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_1 | |
| 5 EXP_A_TX_2_DP | EC5 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_2 | |
| 5 EXP_A_TX_2_DN | EC6 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_2 | |
| 5 EXP_A_TX_3_DP | EC7 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_3 | |
| 5 EXP_A_TX_3_DN | EC8 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_3 | |
| 5 EXP_A_TX_4_DP | EC9 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_4 | |
| 5 EXP_A_TX_4_DN | EC10 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_4 | |
| 5 EXP_A_TX_5_DP | EC11 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_5 | |
| 5 EXP_A_TX_5_DN | EC12 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_5 | |
| 5 EXP_A_TX_6_DP | EC13 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_6 | |
| 5 EXP_A_TX_6_DN | EC14 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_6 | |
| 5 EXP_A_TX_7_DP | EC19 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_7 | |
| 5 EXP_A_TX_7_DN | EC28 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_7 | |
| 5 EXP_A_TX_8_DP | EC49 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_8 | |
| 5 EXP_A_TX_8_DN | EC50 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_8 | |
| 5 EXP_A_TX_9_DP | EC30 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_9 | |
| 5 EXP_A_TX_9_DN | EC29 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_9 | |
| 5 EXP_A_TX_10_DP | EC33 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_10 | |
| 5 EXP_A_TX_10_DN | EC35 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_10 | |
| 5 EXP_A_TX_11_DP | EC32 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_11 | |
| 5 EXP_A_TX_11_DN | EC31 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_11 | |
| 5 EXP_A_TX_12_DP | EC37 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_12 | |
| 5 EXP_A_TX_12_DN | EC38 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_12 | |
| 5 EXP_A_TX_13_DP | EC36 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_13 | |
| 5 EXP_A_TX_13_DN | EC34 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_13 | |
| 5 EXP_A_TX_14_DP | EC39 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_14 | |
| 5 EXP_A_TX_14_DN | EC48 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_14 | |
| 5 EXP_A_TX_15_DP | EC40 | 0.22UF 10V X5R 0402 | EEXP_A_TXP_15 | |
| 5 EXP_A_TX_15_DN | EC41 | 0.22UF 10V X5R 0402 | EEXP_A_TXN_15 | |





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Title: PCIEX16 SLOT 1 & 2

Size: C | Document Number: IH11K-MHS | Rev: 6.1

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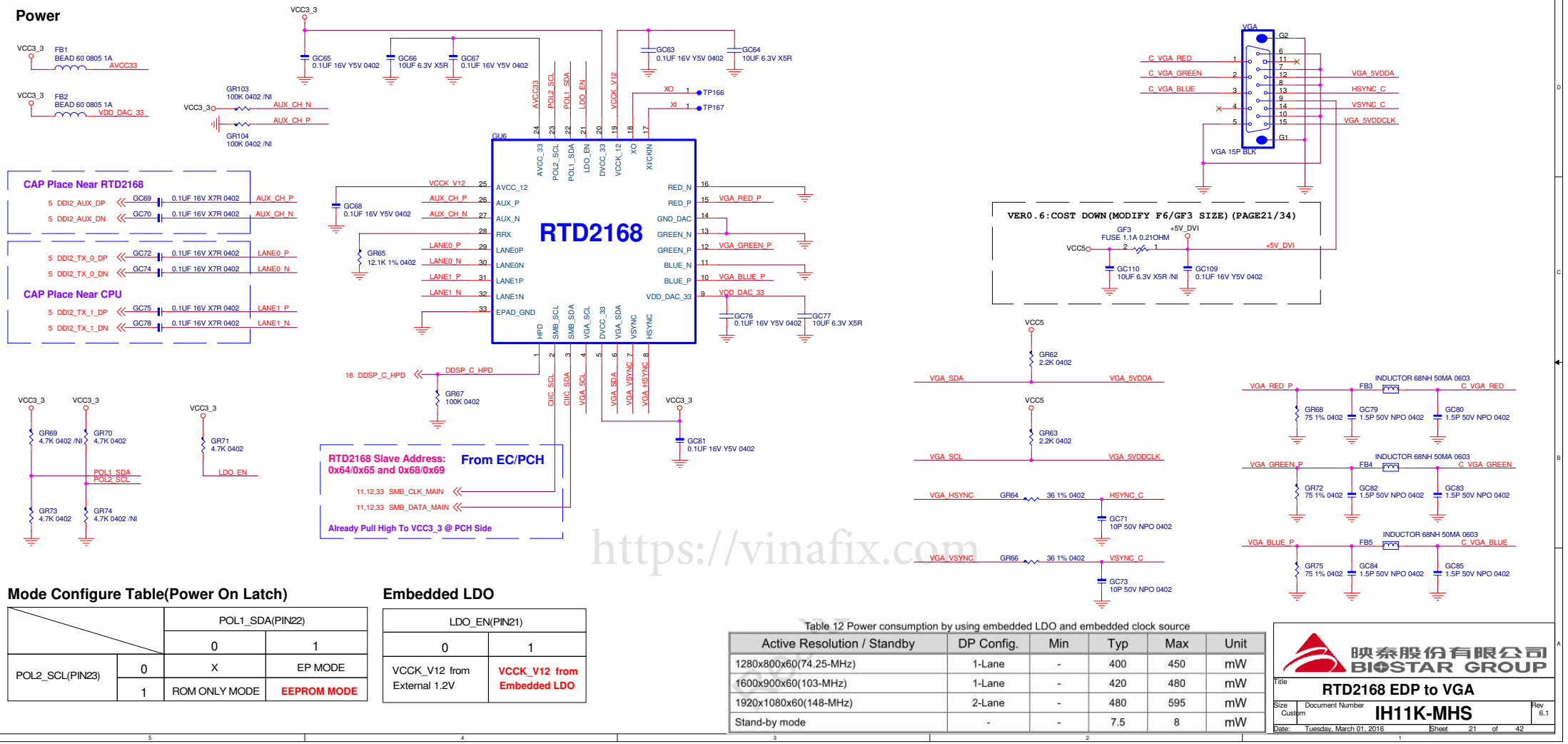


## Mode Configure Table(Power On Latch)

| | | POL1_SDA(PIN22) | |
|---|---|---|---|
| | | 0 | 1 |
| POL2_SCL(PIN23) | 0 | X | EP MODE |
| | 1 | ROM ONLY MODE | **EEPROM MODE** |

## Embedded LDO

| LDO_EN(PIN21) | |
|---|---|
| 0 | 1 |
| VCCK_V12 from External 1.2V | **VCCK_V12 from Embedded LDO** |

Table 12 Power consumption by using embedded LDO and embedded clock source

| Active Resolution / Standby | DP Config. | Min | Typ | Max | Unit |
|---|---|---|---|---|---|
| 1280x800x60(74.25-MHz) | 1-Lane | - | 400 | 450 | mW |
| 1600x900x60(103-MHz) | 1-Lane | - | 420 | 480 | mW |
| 1920x1080x60(148-MHz) | 2-Lane | - | 480 | 595 | mW |
| Stand-by mode | - | - | 7.5 | 8 | mW |

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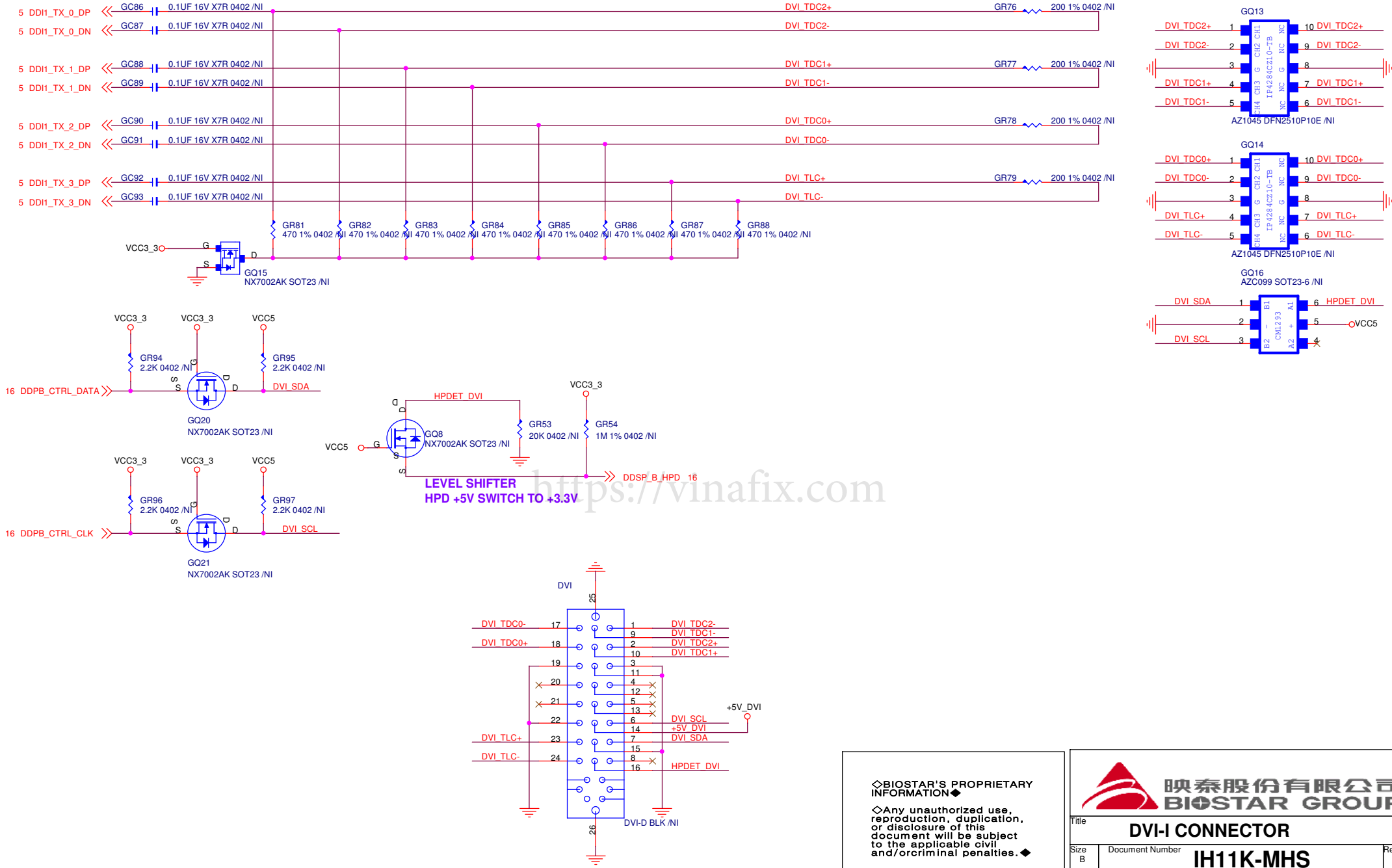
Title: RTD2168 EDP to VGA

Size: Custom | Document Number: IH11K-MHS | Rev: 6.1

Date: Tuesday, March 01, 2016 | Sheet 21 of 42





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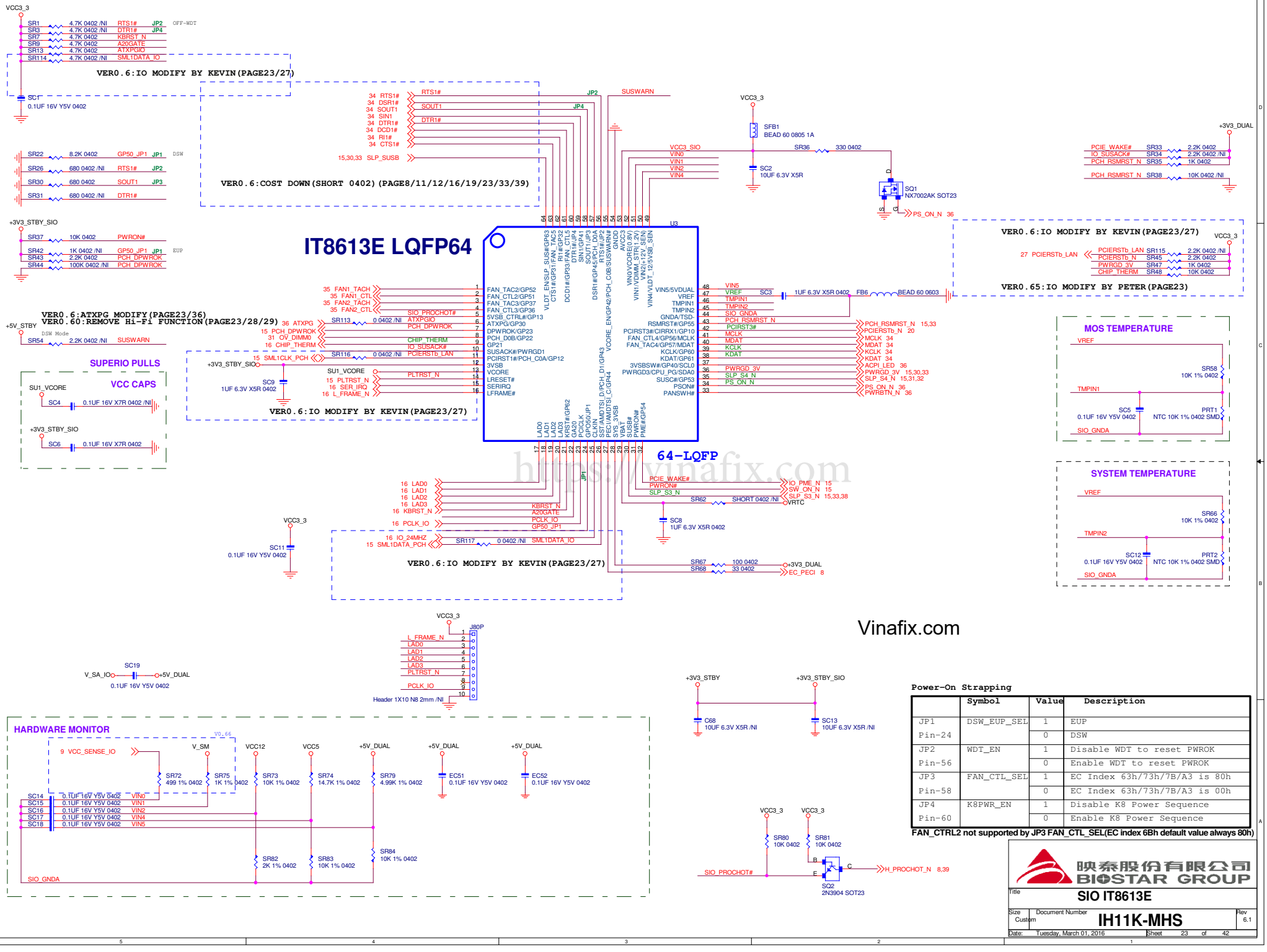
Title: DVI-I CONNECTOR

Size: B | Document Number: IH11K-MHS | Rev: 6.1

Date: Tuesday, March 01, 2016 | Sheet 22 of 42




## Power-On Strapping

| | Symbol | Value | Description |
|---|---|---|---|
| JP1 | DSW_EUP_SEL | 1 | EUP |
| Pin-24 | | 0 | DSW |
| JP2 | WDT_EN | 1 | Disable WDT to reset PWROK |
| Pin-56 | | 0 | Enable WDT to reset PWROK |
| JP3 | FAN_CTL_SEL | 1 | EC Index 63h/73h/7B/A3 is 80h |
| Pin-58 | | 0 | EC Index 63h/73h/7B/A3 is 00h |
| JP4 | K8PWR_EN | 1 | Disable K8 Power Sequence |
| Pin-60 | | 0 | Enable K8 Power Sequence |

FAN_CTRL2 not supported by JP3 FAN_CTL_SEL(EC index 6Bh default value always 80h)

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Title: SIO IT8613E

Size: Custom | Document Number: IH11K-MHS | Rev: 6.1

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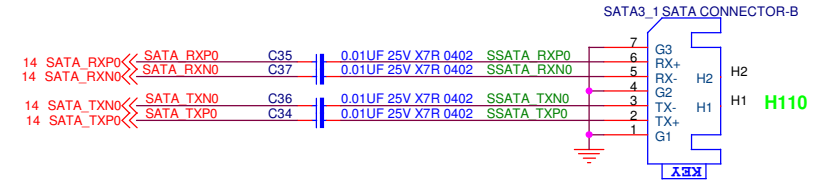


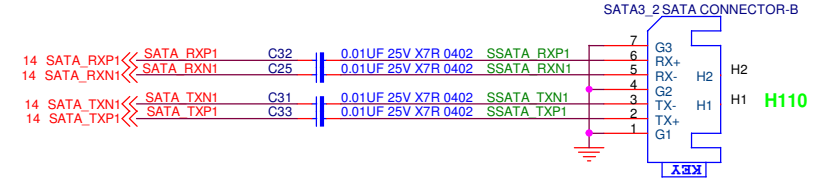


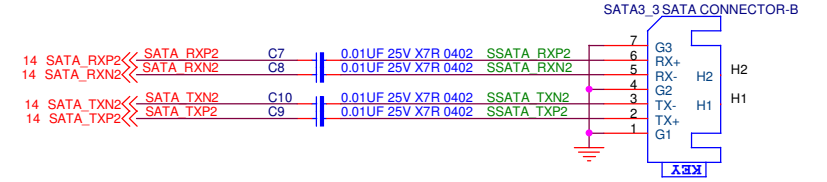


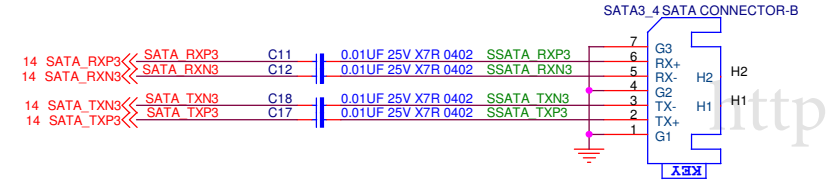


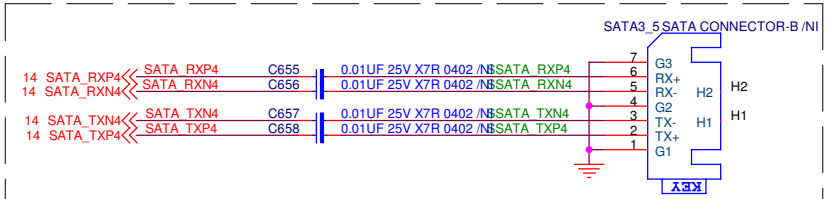


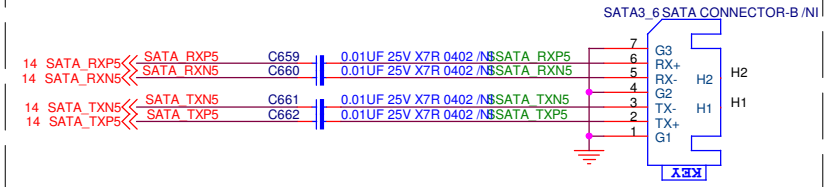


VER0.65:NEW ADD SATA CONN(PAGE14/24)

VER0.60:REMOVE SATA EXPRESS CONN(PAGE14/16/17/24)



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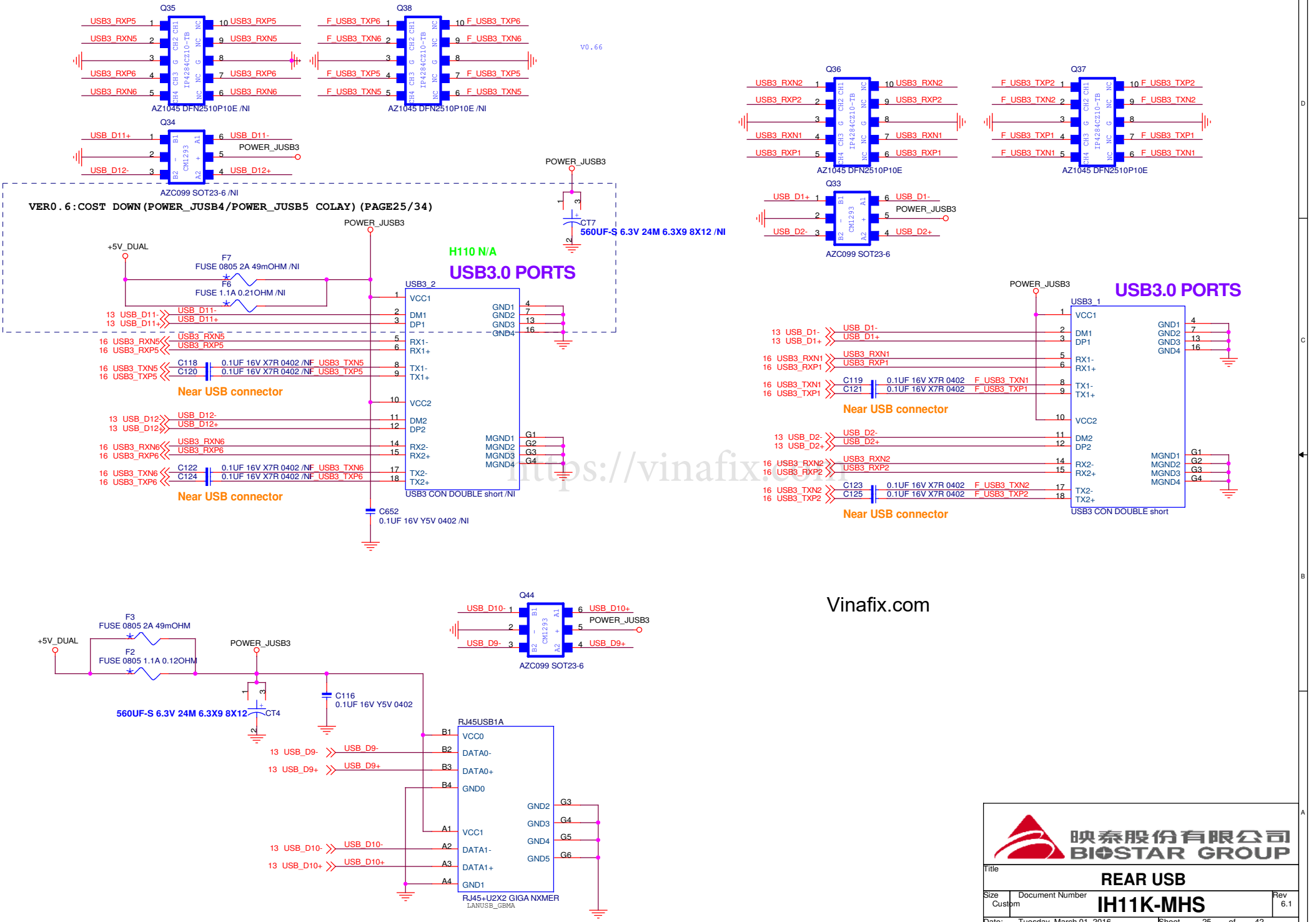
| | | |
|---|---|---|
| Title | SATA EXPRESS | |
| Size B | Document Number IH11K-MHS | Rev 6.1 |
| Date: Tuesday, March 01, 2016 | Sheet 24 of 42 | |


Q35
USB3_RXP5
USB3_RXN5
USB3_RXP6
USB3_RXN6
AZ1045 DFN2510P10E /NI
Q38
F_USB3_TXP6
F_USB3_TXN6
F_USB3_TXP5
F_USB3_TXN5
AZ1045 DFN2510P10E /NI
V0.66
Q34
USB_D11+
USB_D11-
POWER_JUSB3
USB_D12-
USB_D12+
AZC099 SOT23-6 /NI
Q36
USB3_RXN2
USB3_RXP2
USB3_RXN1
USB3_RXP1
AZ1045 DFN2510P10E
Q37
F_USB3_TXP2
F_USB3_TXN2
F_USB3_TXP1
F_USB3_TXN1
AZ1045 DFN2510P10E
Q33
USB_D1+
USB_D1-
POWER_JUSB3
USB_D2-
USB_D2+
AZC099 SOT23-6
VER0.6:COST DOWN(POWER_JUSB4/POWER_JUSB5 COLAY)(PAGE25/34)
POWER_JUSB3
CT7
560UF-S 6.3V 24M 6.3X9 8X12 /NI
H110 N/A
USB3.0 PORTS
+5V_DUAL
F7
FUSE 0805 2A 49mOHM /NI
F6
FUSE 1.1A 0.21OHM /NI
USB3_2
VCC1
DM1
DP1
RX1-
RX1+
VCC2
DM2
DP2
RX2-
RX2+
TX2-
TX2+
GND1
GND2
GND3
GND4
MGND1
MGND2
MGND3
MGND4
USB_D11-
USB_D11+
USB3_RXN5
USB3_RXP5
C118
C120
0.1UF 16V X7R 0402 /NF_USB3_TXN5
0.1UF 16V X7R 0402 /NF_USB3_TXP5
Near USB connector
USB_D12-
USB_D12+
USB3_RXN6
USB3_RXP6
C122
C124
0.1UF 16V X7R 0402 /NF_USB3_TXN6
0.1UF 16V X7R 0402 /NF_USB3_TXP6
Near USB connector
C652
0.1UF 16V Y5V 0402 /NI
USB3 CON DOUBLE short /NI
POWER_JUSB3
USB3.0 PORTS
USB3_1
USB_D1-
USB_D1+
USB3_RXN1
USB3_RXP1
C119
C121
0.1UF 16V X7R 0402
F_USB3_TXN1
F_USB3_TXP1
Near USB connector
USB_D2-
USB_D2+
USB3_RXN2
USB3_RXP2
C123
C125
0.1UF 16V X7R 0402
F_USB3_TXN2
F_USB3_TXP2
Near USB connector
USB3 CON DOUBLE short
Q44
USB_D10-
USB_D10+
POWER_JUSB3
USB_D9-
USB_D9+
AZC099 SOT23-6
F3
FUSE 0805 2A 49mOHM
+5V_DUAL
F2
FUSE 0805 1.1A 0.12OHM
POWER_JUSB3
560UF-S 6.3V 24M 6.3X9 8X12
CT4
C116
0.1UF 16V Y5V 0402
RJ45USB1A
VCC0
DATA0-
DATA0+
GND0
VCC1
DATA1-
DATA1+
GND1
GND2
GND3
GND4
GND5
RJ45+U2X2 GIGA NXMER
LANUSB_GBMA
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BIOSTAR GROUP
Title
REAR USB
Size
Custom
Document Number
IH11K-MHS
Rev
6.1
Date:
Tuesday, March 01, 2016
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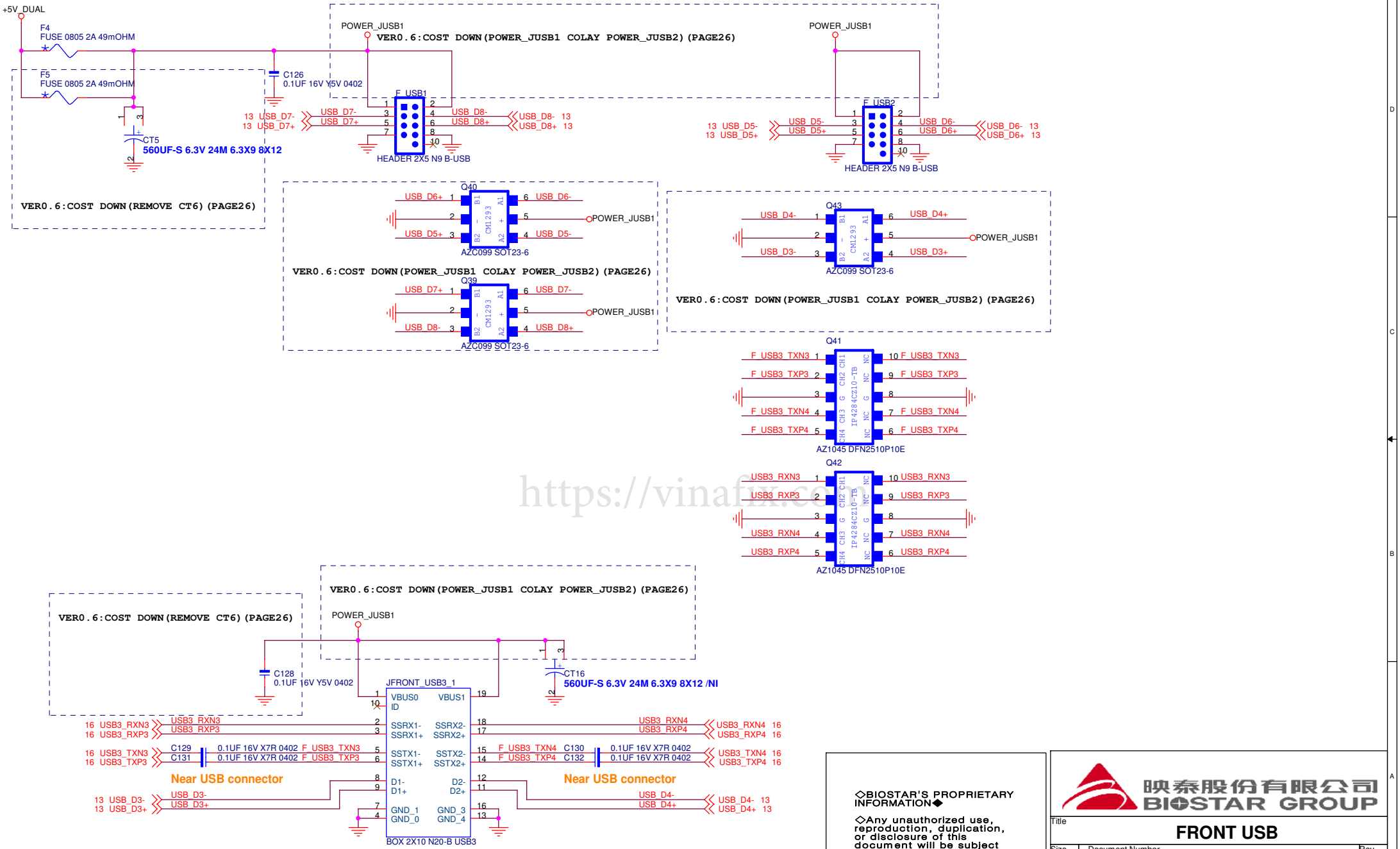
25
of
42



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| | | |
|---|---|---|
| Title | FRONT USB | |
| Size B | Document Number IH11K-MHS | Rev 6.1 |
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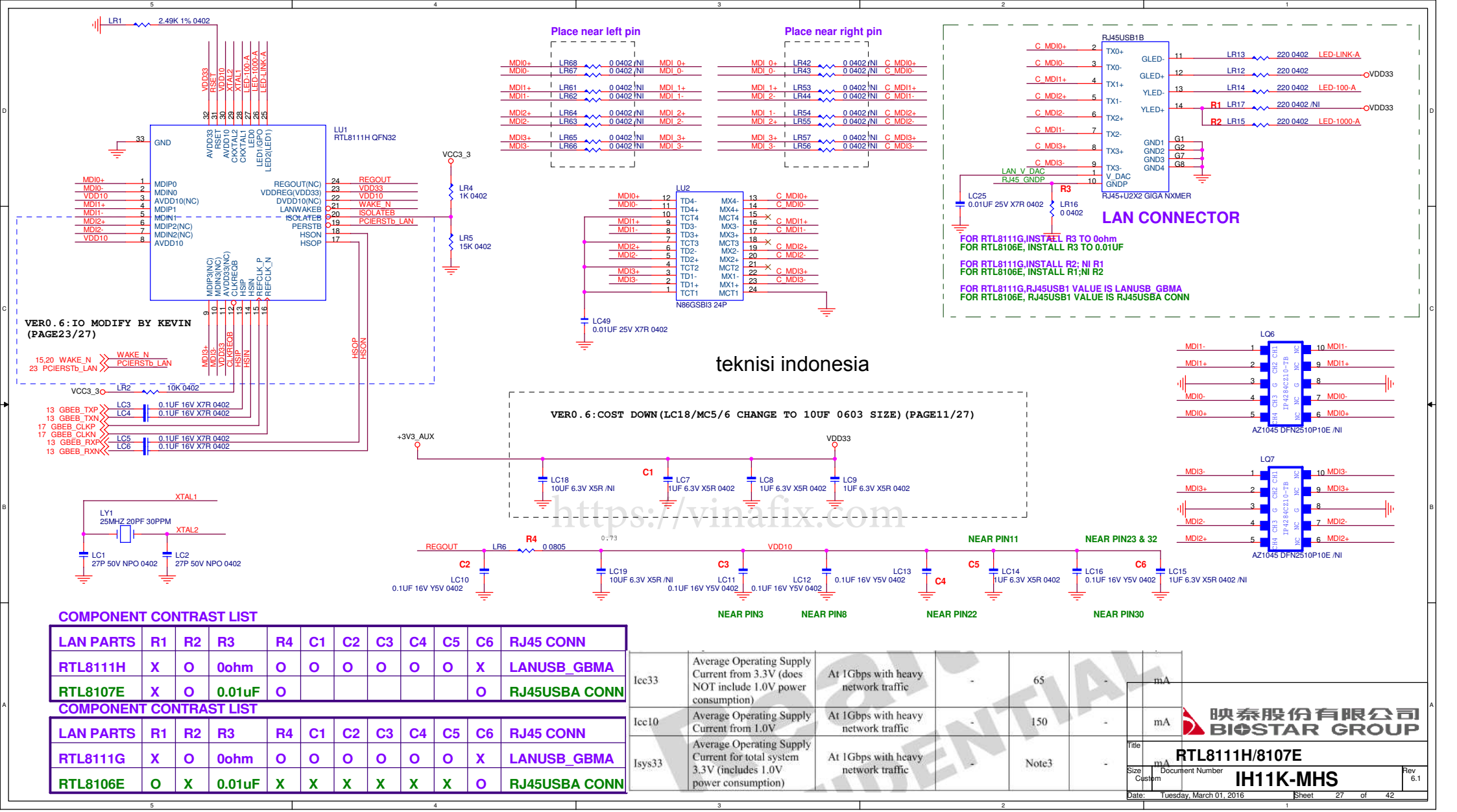


## COMPONENT CONTRAST LIST

| LAN PARTS | R1 | R2 | R3 | R4 | C1 | C2 | C3 | C4 | C5 | C6 | RJ45 CONN |
|---|---|---|---|---|---|---|---|---|---|---|---|
| RTL8111H | X | O | 0ohm | O | O | O | O | O | O | X | LANUSB_GBMA |
| RTL8107E | X | O | 0.01uF | O | | | | | | O | RJ45USBA CONN |

## COMPONENT CONTRAST LIST

| LAN PARTS | R1 | R2 | R3 | R4 | C1 | C2 | C3 | C4 | C5 | C6 | RJ45 CONN |
|---|---|---|---|---|---|---|---|---|---|---|---|
| RTL8111G | X | O | 0ohm | O | O | O | O | O | O | X | LANUSB_GBMA |
| RTL8106E | O | X | 0.01uF | X | X | X | X | X | X | O | RJ45USBA CONN |

| | | | | | |
|---|---|---|---|---|---|
| Icc33 | Average Operating Supply Current from 3.3V (does NOT include 1.0V power consumption) | At 1Gbps with heavy network traffic | - | 65 | - mA |
| Icc10 | Average Operating Supply Current from 1.0V | At 1Gbps with heavy network traffic | - | 150 | - mA |
| Isys33 | Average Operating Supply Current for total system 3.3V (includes 1.0V power consumption) | At 1Gbps with heavy network traffic | - | Note3 | - mA |



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Title: RTL8111H/8107E

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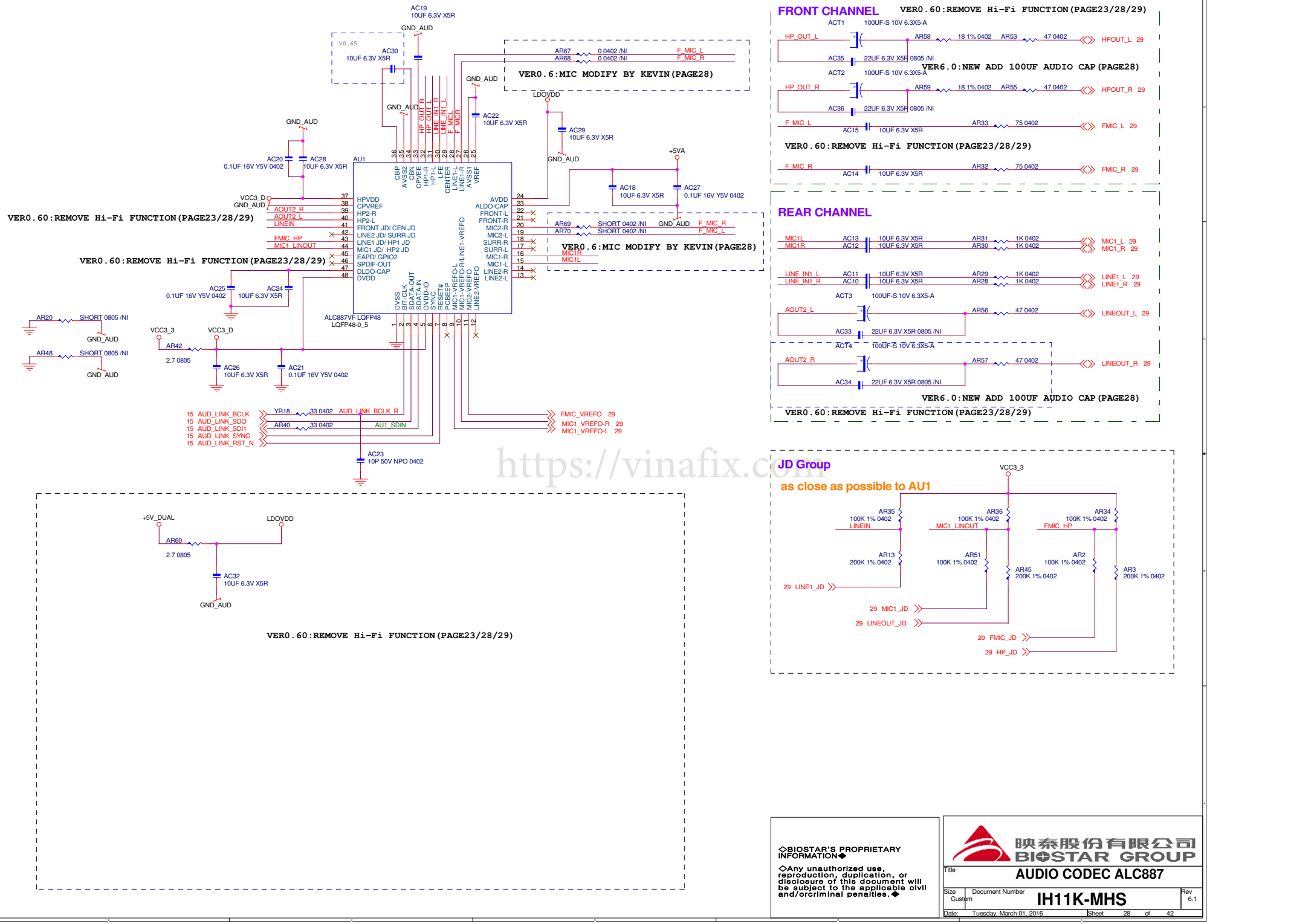

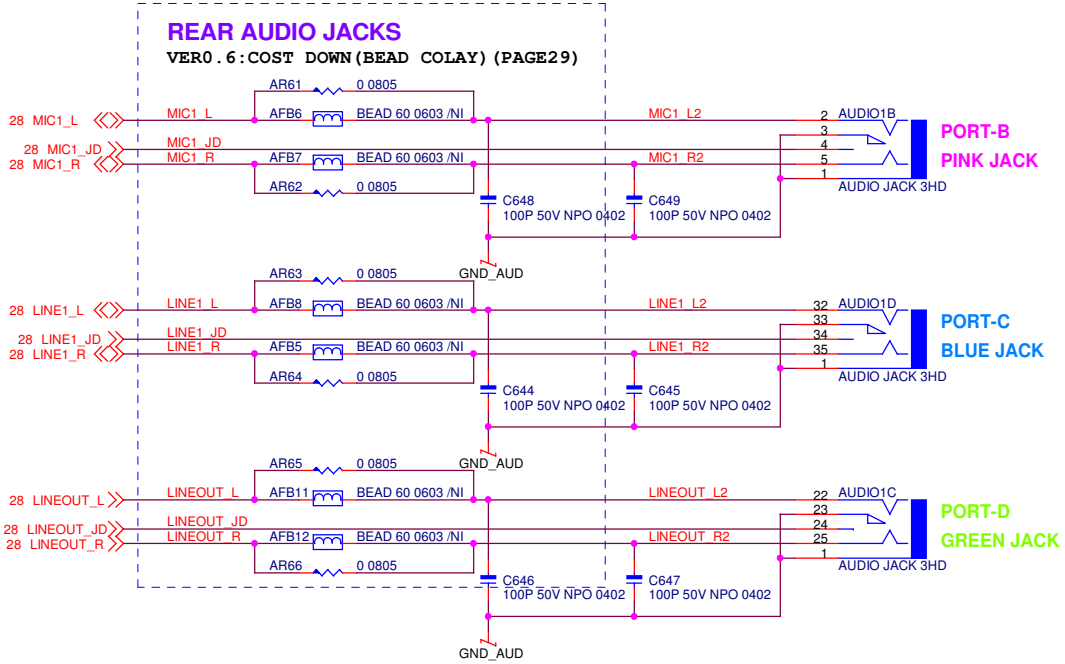


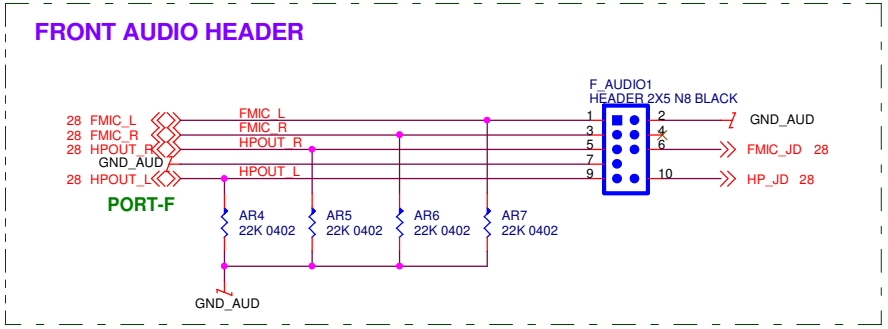


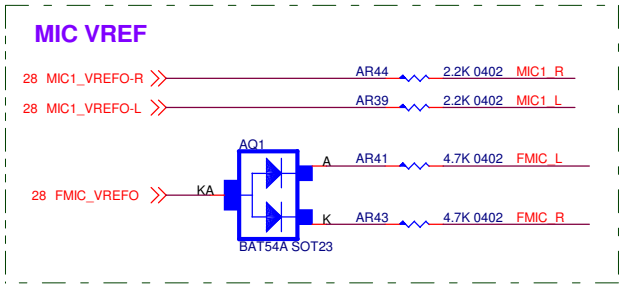


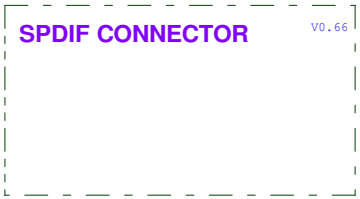


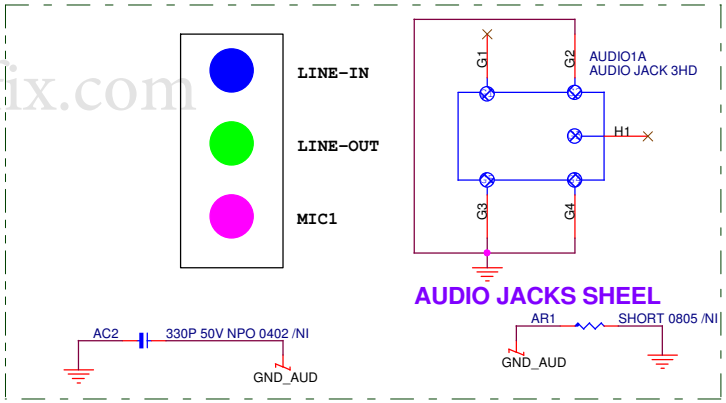




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Title: AUDIO CONNECTOR

| Size | Document Number | Rev |
|---|---|---|
| B | IH11K-MHS | 6.1 |

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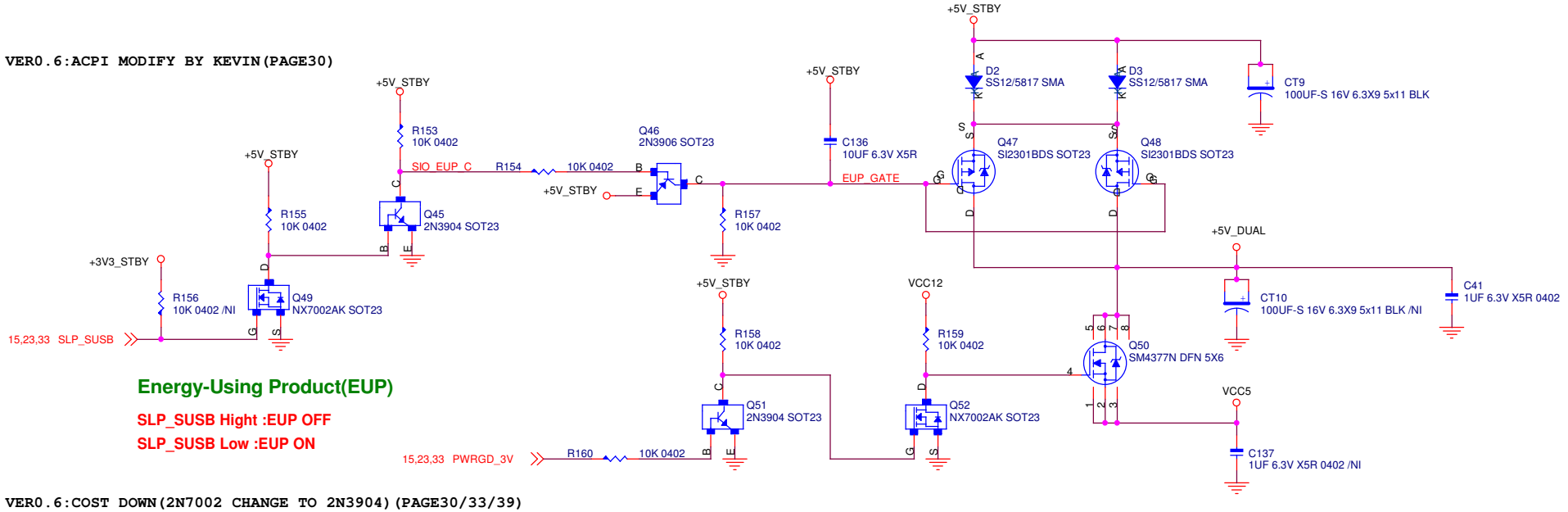
VER0.6:ACPI MODIFY BY KEVIN(PAGE30)




**Energy-Using Product(EUP)**

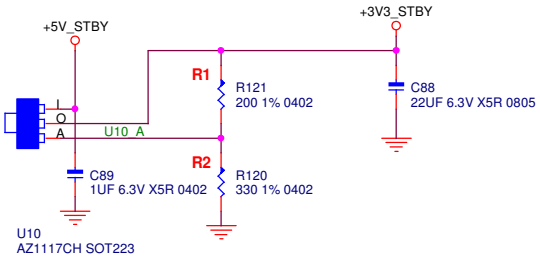
SLP_SUSB Hight :EUP OFF

SLP_SUSB Low :EUP ON

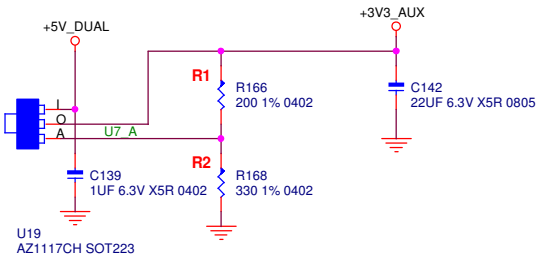
VER0.6:COST DOWN(2N7002 CHANGE TO 2N3904)(PAGE30/33/39)

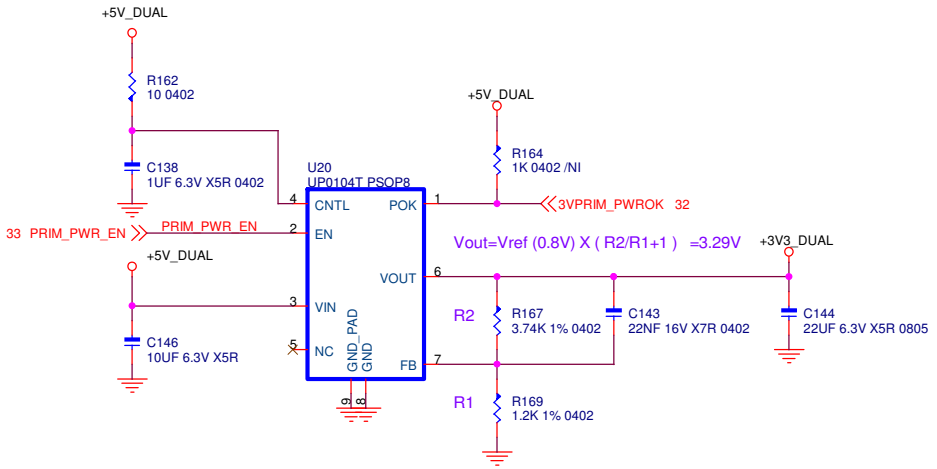


Vout=Vref (1.25V) X ( 1+R2/R1 )=3.3125V




Vout=Vref (1.25V) X ( 1+R2/R1 )=3.3125V

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| | | |
|---|---|---|
| Title | ACPI POWER | |
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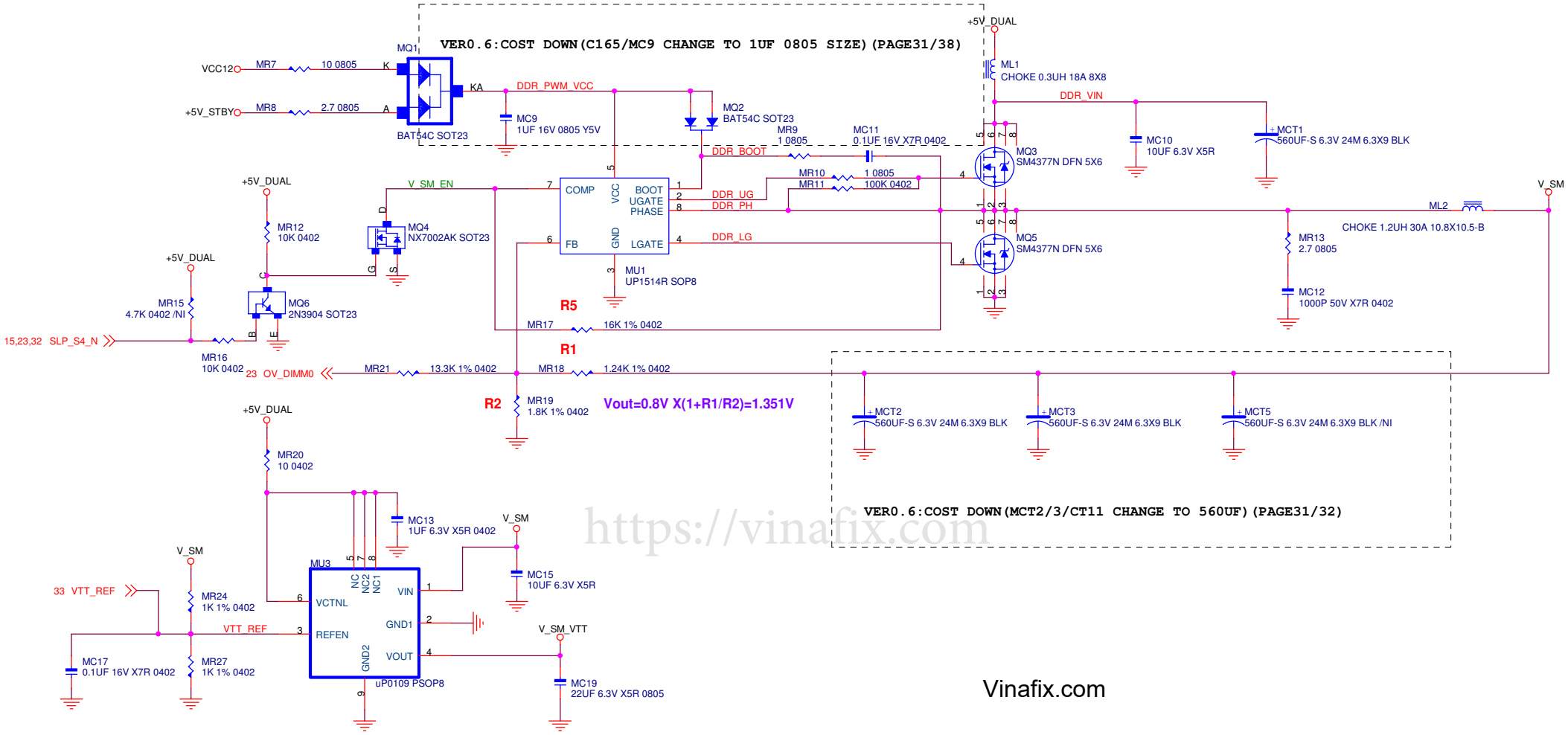
# MEMORY PART:M+Reference



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| | | |
|---|---|---|
| Title | MEMORY DC-DC | |
| Size B | Document Number IH11K-MHS | Rev 6.1 |
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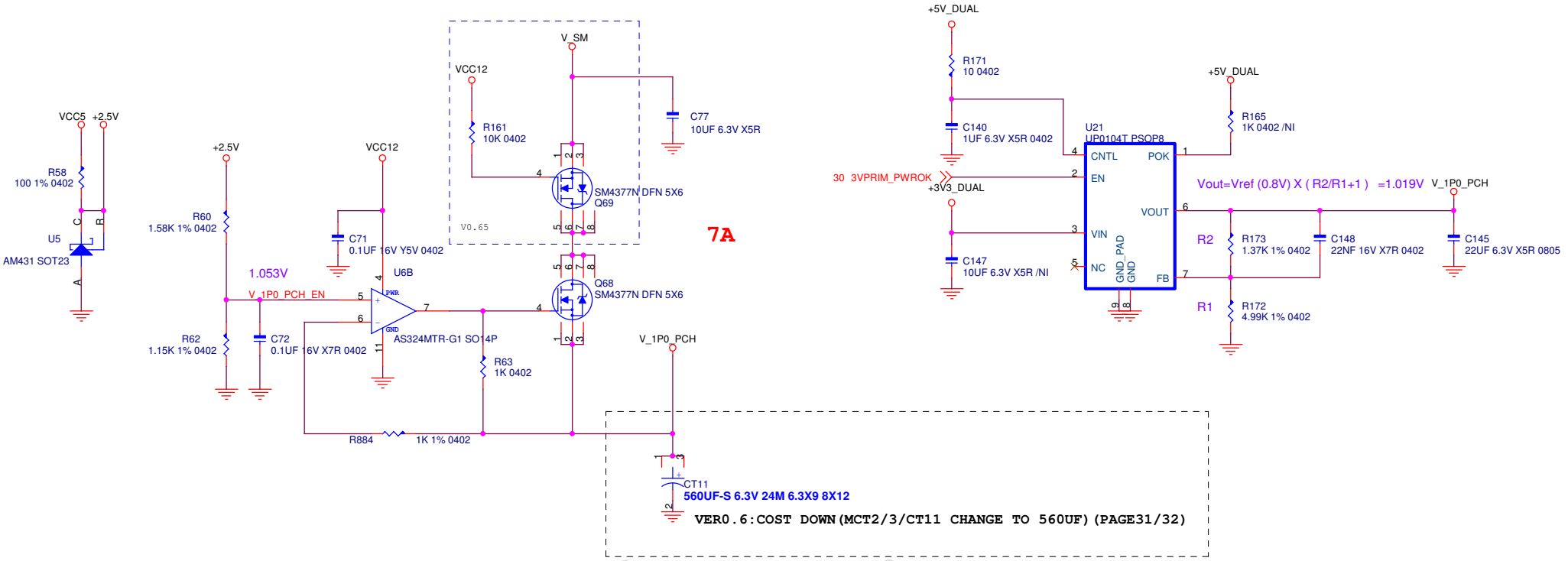




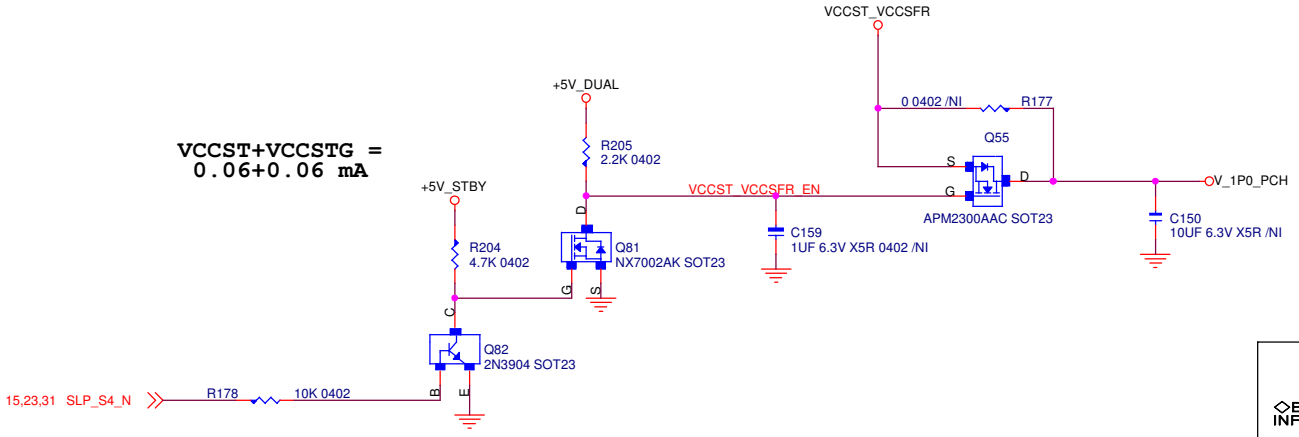




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Title: V_1P0_PCH

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39 VR_RDY >> VR_RDY R210 PCH_SYSPWROK >> PCH_SYSPWROK 15

ISEN_SHORT /NI

1.045V

VER0.6:COST DOWN(SHORT 0402)(PAGE8/11/12/16/19/23/33/39)

VCCST_VCCSFR

R211 10K 0402

VCCST_PWRGD 8

Q56 NX7002AK SOT23

CC38 0.01UF 25V X7R 0402 /NI

+5V_DUAL

R184 4.7K 0402

VCC3_3

VCCSTPWRGDG

R185 1K 0402

Q57 2N3904 SOT23

39 VR_RDY

R187 10K 0402

+5V_STBY

PCH_RSMRST_N 15,23

R188 10K 0402

Q58 NX7002AK SOT23

VER0.6:COST DOWN(2N7002 CHANGE TO 2N3904)(PAGE30/33/39)

Q59 2N3904 SOT23

15,23,30 SLP_SUSB

R189 10K 0402

+5V_DUAL

VCORE_EN

VCORE_EN 39

Q60 NX7002AK SOT23

TR1 4.7K 0402

PWR_EN

V_SA_IO

TQ1 2N3904 SOT23

+5V_DUAL

TR3 8.2K 0402

R75 10K 0402

TC1 1UF 6.3V X5R 0402

VR_RDY

VR_RDY 39

Q64 NX7002AK SOT23

TQ2 2N3904 SOT23

15,23,38 SLP_S3_N

TR5 10K 0402

+5V_DUAL

R170 2.2K 0402 /NI

PRIM_PWR_EN 30

+5V_DUAL

R174 4.7K 0402 /NI

Q53 NX7002AK SOT23 /NI

Q54 2N3904 SOT23 /NI

15,23,30 SLP_SUSB

R176 10K 0402 /NI

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Use of DDR_VTT_CNTL to control VTT power gate is optional
for additional power savings in Idle power states.
If not used,
VTT should be controlled by SLP_S3#

+5V_DUAL

MR33 10K 0402

VTT_REF

VTT_REF 31

MQ10 NX7002AK SOT23

VTTREFG

MQ9 2N3904 SOT23

15,23,38 SLP_S3_N

MR58 10K 0402

8 DDR_VTT_CTL

MR30 10K 0402 /NI

VCC3_3

R192 2.7K 0402

Q65 NX7002AK SOT23

15,20 SMB_CLK_RESUME

SMB_CLK_MAIN 11,12,21

VCC12

VCC3_3

R193 1K 0402

R194 2.7K 0402

15,20 SMB_DATA_RESUME

SMB_DATA_MAIN 11,12,21

Q67 NX7002AK SOT23

FOR POWER TEST

PWRGD_3V 15,23,30

Q66 2N3904 SOT23

8,16,39 H_SKTOCC_N

R195 10K 0402

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Title: RESUME RESET LOGIC

Size: B | Document Number: IH11K-MHS | Rev: 6.1

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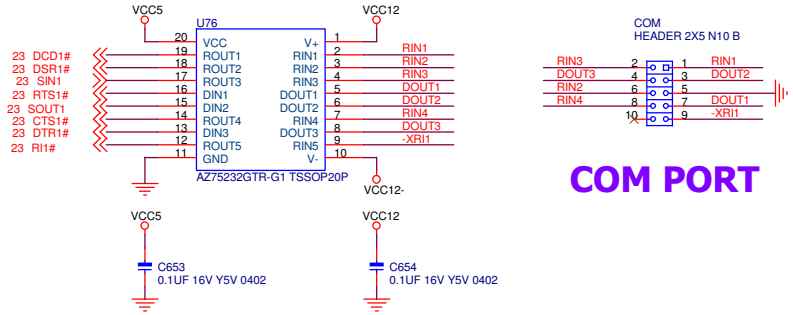


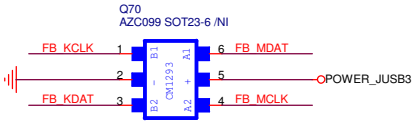




## COM PORT

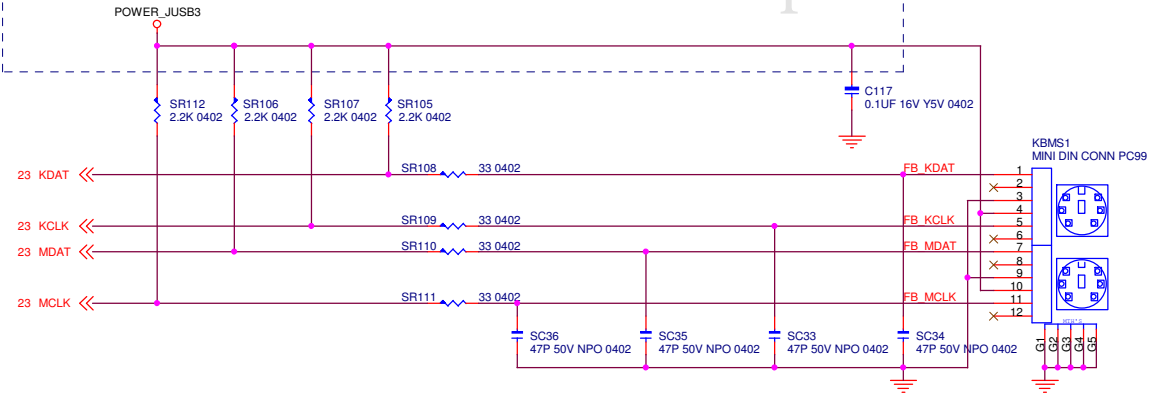
## WAKE ON RING

## KEYBOARD & MOUSE






**VER0.6:COST DOWN(POWER_JUSB4/POWER_JUSB5 COLAY)(PAGE25/34)**



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Title: COM1 / PS2 CONN

Size: Custom | Document Number: IH11K-MHS | Rev: 6.1

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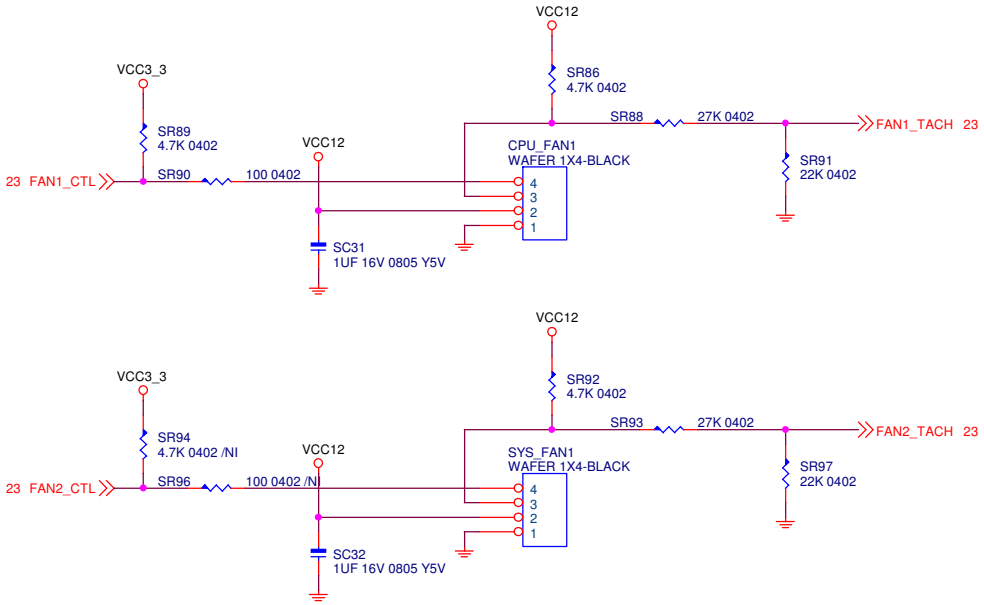






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Title: FAN & PS2

| Size | Document Number | Rev |
|---|---|---|
| B | IH11K-MHS | 6.1 |

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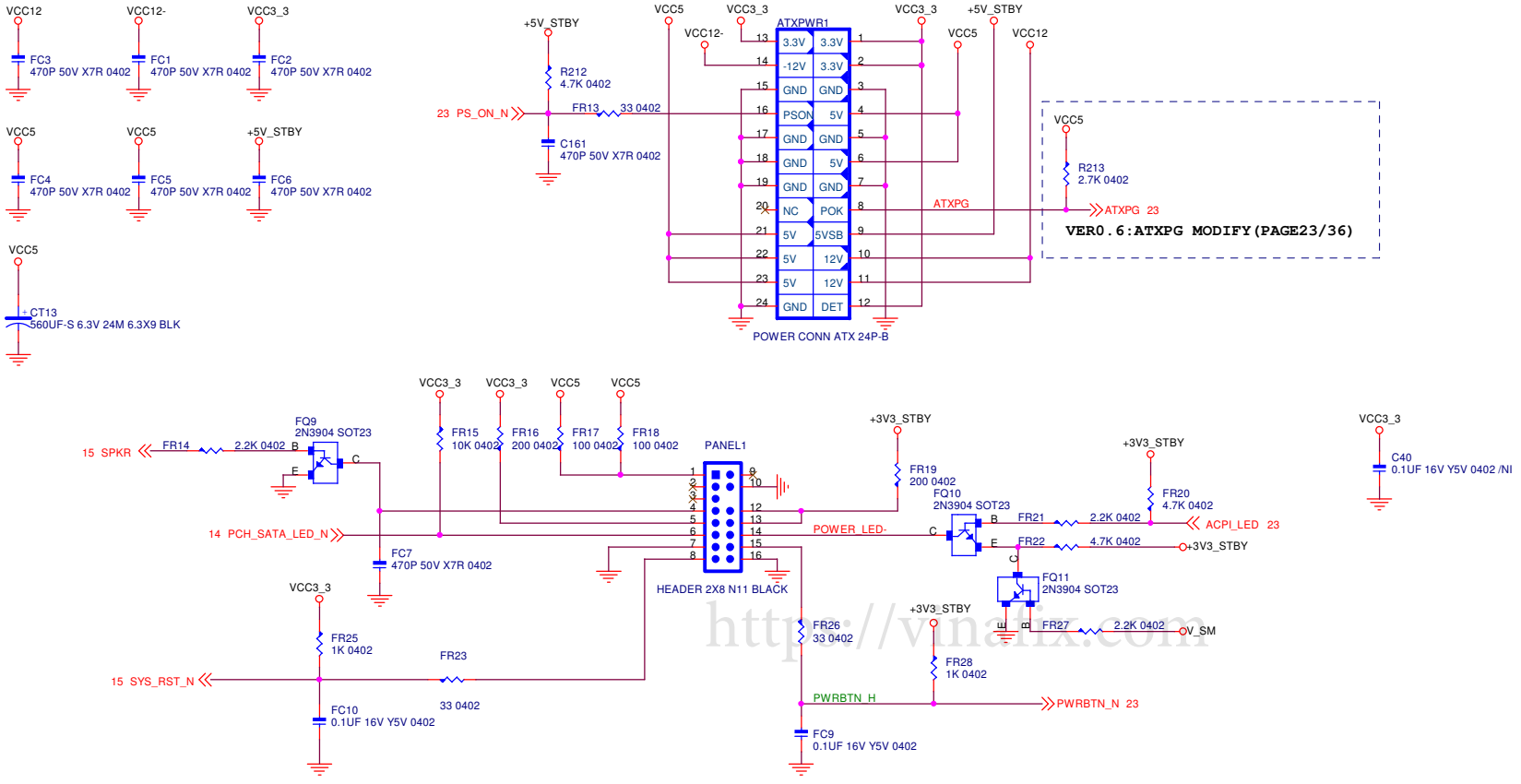
# FP PART: F+Reference





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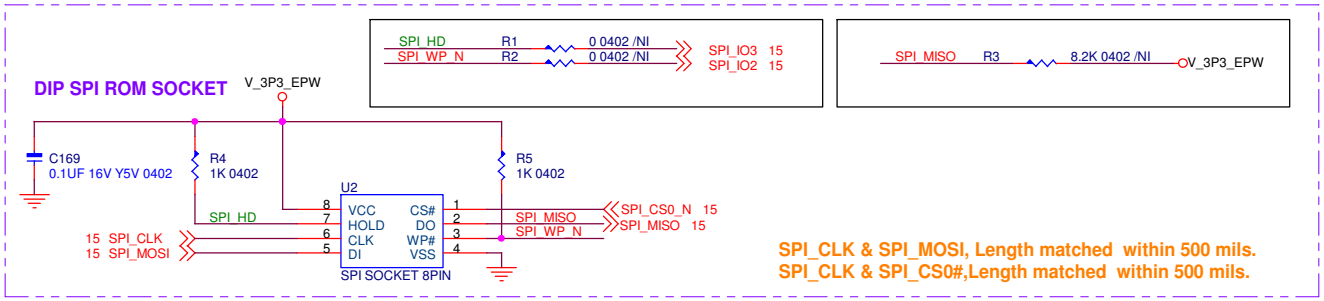
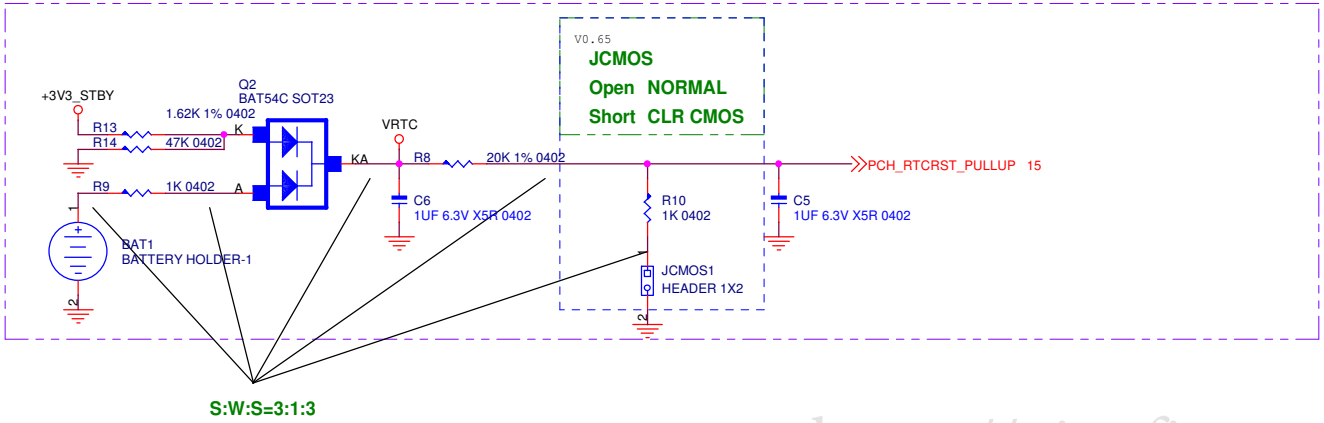
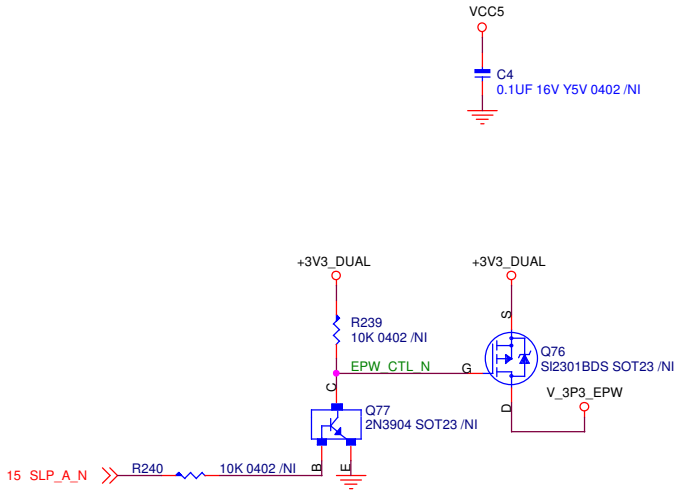
Title: 24PIN CONN & FP

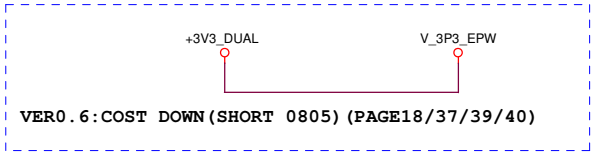
Size: Custom | Document Number: IH11K-MHS | Rev: 6.1

Date: Tuesday, March 01, 2016 | Sheet 36 of 42





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Title: SPI ROM/RTC CRYSTAL/BAT

Size: B | Document Number: IH11K-MHS | Rev: 6.1

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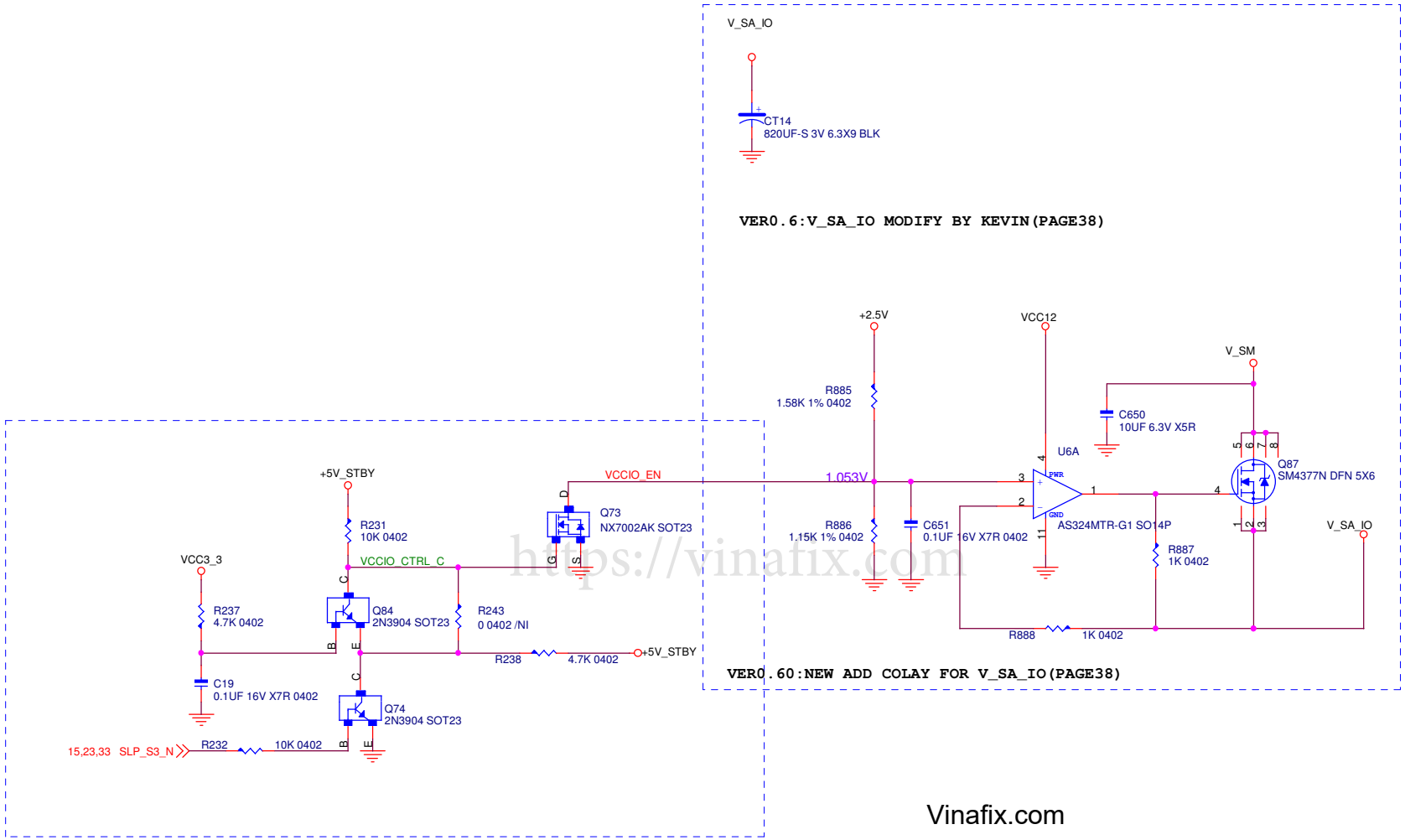




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Title: VCCIO/VCCSA DC-DC

Size: B | Document Number: IH11K-MHS | Rev: 6.1

Date: Tuesday, March 01, 2016 | Sheet 38 of 42

VER0.6:COST DOWN(CPU PWM CHANHE TO RT3606)(PAGE39/40/41)

VCCST_VCCSFR

8 H_VIDSOUT — VR_VIDSOUT PR330 100 1% 0402

8 H_VIDSCK — VR_VIDSCLK PR331 45.3 1% 0402

PC220 1UF 6.3V X5R 0402

VER0.65:PU1 core power change to +12V(PAGE39)

VCC12

PR338 26.1K 1% 0402

3.3V

33 VCORE_EN

PR344 10K 1% 0402

PC224 0.1UF 16V X7R 0402 /NI

VER0.65:PU1 core power change to +12V(PAGE39)

VCC5_3606 VCC5 12VIN PVCC_3606

PR328 2.7 0805

PR329 4.7 0805

PC218 10UF 6.3V X5R

PC219 4.7UF 16V Y5V 0805

12VIN

ATXPWR2

POWER CONN ATX12V 2X2-B

VER0.60:CHANGE CPU POWER CONN TO 2*2(PAGE39)

12VIN

PR334 499K 1% 0402

Sensor POR Min 2V

PR336 200K 1% 0402

PC221 0.1UF 16V X7R 0402

PU1

33 VCORE_EN — EN

33 VR_RDY — PGOOD

8,23 H_PROCHOT_N — VRHOT#

VR_VIDSOUT PR339 10 0402 VDIO_3606

VR_VIDSCLK PR341 49.9 1% 0402 VCLK_3606

8 H_VIDALERT_N — PR342 SHORT 0402 /NI ALERTN

VDIO VCLK ALERT#

VREF_3606

PC223 0.47UF 6.3V X5R 0402

PR343 2.2 0402

VREF_3606 — VREF

IMON_3606 — IMON

IMONA_3606 — IMONA

VCC PVCC

DVD

BOOT1 UGATE1 PHASE1 LGATE1 — RT3606_BOOT1 RT3606_UG1 RT3606_PH1 RT3606_LG1

ISEN1P ISEN1N — ISEN1P_3606 ISEN1N3606 PR340 680 1% 0402 PC222 0.1UF 16V X7R 0402

BOOT2 UGATE2 PHASE2 LGATE2 — RT3606_BOOT2 RT3606_UG2 RT3606_PH2 RT3606_LG2

ISEN2P ISEN2N — ISEN2P_3606 ISEN2N3606 PR345 680 1% 0402 PC225 0.1UF 16V X7R 0402

PWM3 — RT3606_PWM3

ISEN3P ISEN3N — ISEN3P_3606 ISEN3N3606 PR351 680 1% 0402 PC228 0.1UF 16V X7R 0402

BOOTA1 UGATEA1 PHASEA1 LGATEA1 — RT3606_GT_BOOTA1 RT3606_GT_UGA1 RT3606_GT_PHA1 RT3606_GT_LGA1

ISENA1P ISENA1N — ISENA1P_3606GT ISENA1N3606 PR357 680 1% 0402 PC233 0.1UF 16V X7R 0402

PWMA2 — RT3606_GT_PWMA2

ISENA2P ISENA2N — ISENA2P_3606GT ISENA2N3606 PR363 680 1% 0402 PC236 0.1UF 16V X7R 0402

ISENA2P_3606GT PR408 10K 1% 0402 /NI

ISENA2N3606 PR409 10K 1% 0402 /NI

VCC5

SET1 SET2 SET3 SETA1 SETA2

PR369 53.6K 1% 0402 PR370 4.99K 1% 0402

PR372 10.5K 1% 0402 PR373 422 1% 0402

PR374 56.2K 1% 0402 PR375 8.87K 1% 0402

PR377 16K 1% 0402 PR378 180 1% 0402

PR380 150K 1% 0402 PR381 21.5K 1% 0402

PR384 3.3K 1% 0402 PR385 0 0402

PR387 62K 1% 0402 PR388 3.3K 1% 0402

PR391 6.8K 0402 PR392 665 1% 0402

PR393 36K 1% 0402 PR394 2.49K 1% 0402

PR395 10K 1% 0402 PR396 0 0402

VREF_3606

remote sence

9 VCC_SENSE — PR347 10K 1% 0402 — PR348 28K 1% 0402 — COMP_3606 — COMP

V_CPU_CORE — PR349 100 1% 0402 — PC226 470P 50V X7R 0402 — PC227 68P 50V NPO 0402

Local sence

FB_3606 — FB

9 VSS_SENSE — PR352 100 1% 0402 — RGND

Close to PIN14

PC229 0.1UF 16V X7R 0402 /NI

VSENA_3606 — VSENA

9 VCCGT_SENSE — PR354 10K 1% 0402 — PR355 28K 1% 0402 — COMPA_3606 — COMPA

V_GT — PR356 100 1% 0402 — PC230 470P 50V X7R 0402 — PC231 68P 50V NPO 0402

Local sence

FBA_3606 — FBA

Close to PIN33

9 VSSGT_SENSE — PC232 — RGNDA

PR359 100 1% 0402

0.1UF 16V X7R 0402 /NI

Local sence

NTC1 NTC 100K 1% 0402 /NI — TSEN_3606 — TSEN

PR360 2.7K 1% 0402 /NI — PR361 11K 1% 0402 /NI — PC234 0.1UF 16V X7R 0402 /NI

VR_HOT

NTC2 NTC 100K 1% 0402 /NI — TSENA_3606 — TSENA

PR362 2.7K 1% 0402 /NI — PR364 11K 1% 0402 /NI — PC235 0.1UF 16V X7R 0402 /NI

VER0.65:PU1 core power change to +12V(PAGE39)

PWM Fequency= 400KHz

12VIN — PR365 2.2 0402 — PR366 560K 1% 0402 — TONSET_3606 — TONSET

12VIN — PR367 2.2 0402 — PR368 499K 1% 0402 — TONSETA_3606 — TONSETA

PC237 0.22UF 10V X5R 0402

PC238 0.22UF 10V X5R 0402

PR371 100K 1% 0402 — IBIAS

PS4

VCC5_3606 — PR376 4.7K 1% 0402 /NI — PR379 0 0402 — OFSM_3606 — OFSM

Close to PIN28,PIN29

PR383 4.7K 1% 0402 /NI — PR386 0 0402 — OFSA_3606 — OFSA/PSYS

PC239 0.1UF 16V X7R 0402

RT3606BC WQFN60

GND-PAD 61

NC-1 31 NC-2 39 NC-3 46

VREF_3606

close to VCORE phase1 choke

PR382 8.87K 1% 0402 PR404 442 1% 0402 NTC3 NTC 100K 1% 0402

PR389 8.2K 1% 0402 PR405 665 1% 0402 PR390 2.7K 1% 0402 IMON_3606

close to VCCGT phase1 choke

PR397 20.5K 1% 0402 PR406 4.99K 1% 0402 NTC4 NTC 100K 1% 0402

PR398 16K 1% 0402 PR407 1.24K 1% 0402 PR399 1.33K 1% 0402 IMONA_3606

VER0.65:SET2_3606 MODIFY(PAGE39)

DEFAULT : H --> BOOT 0.8V

ADD CPU : L --> BOOT FROM CPU

SET2_3606

VCC5

PR400 10K 1% 0402

PQ44 SI2301BDS SOT23

SET2ENC

PQ45 2N3904 SOT23

DEFAULT : 5V--> OUTOUT 0.8V

ADD CPU : FLOAT --> OUTOUT FROM CPU

8,16,33 H_SKTOCC_N — PR403 10K 0402 — SET2ENB

PC240 0.1UF 16V X7R 0402 /NI



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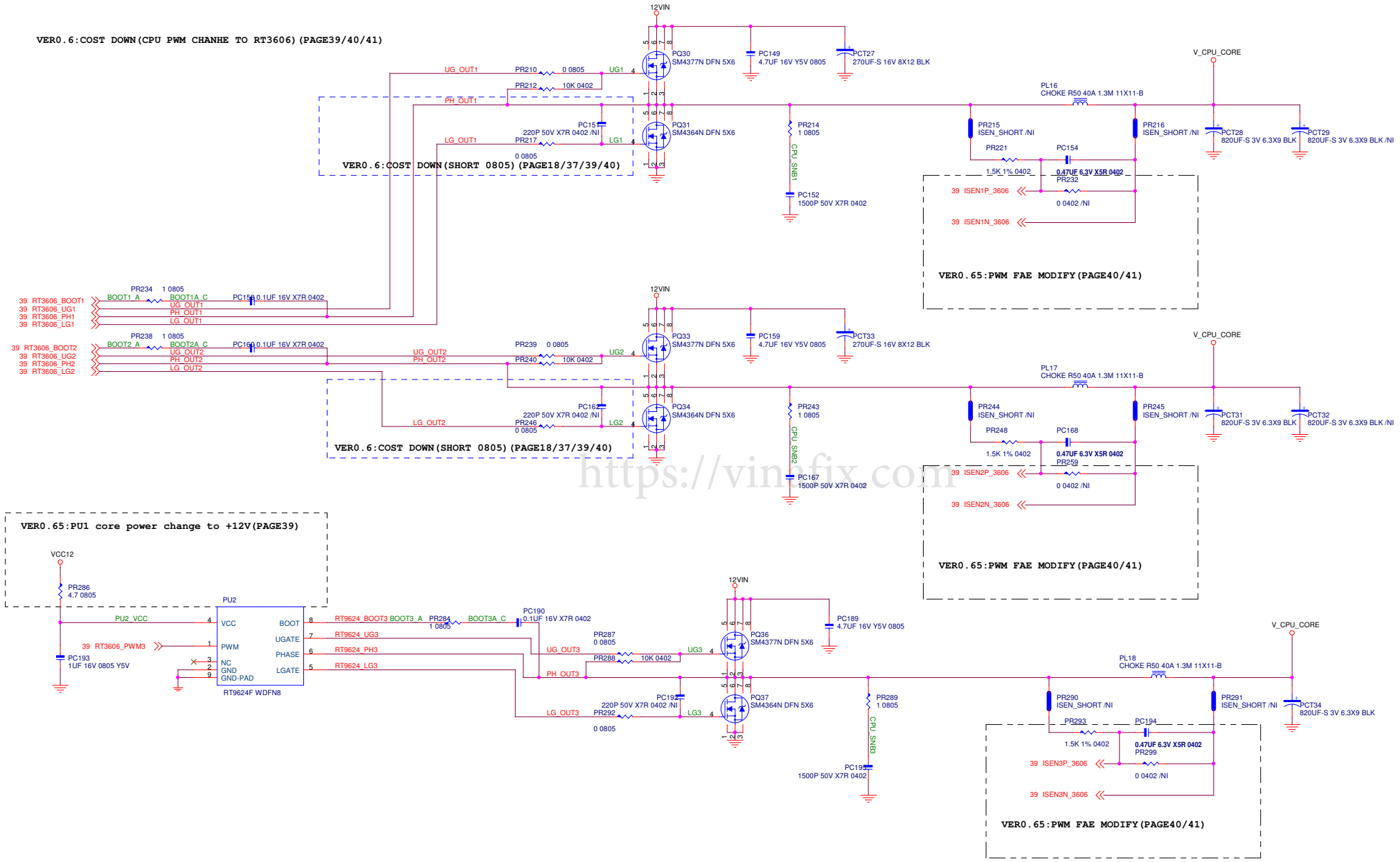




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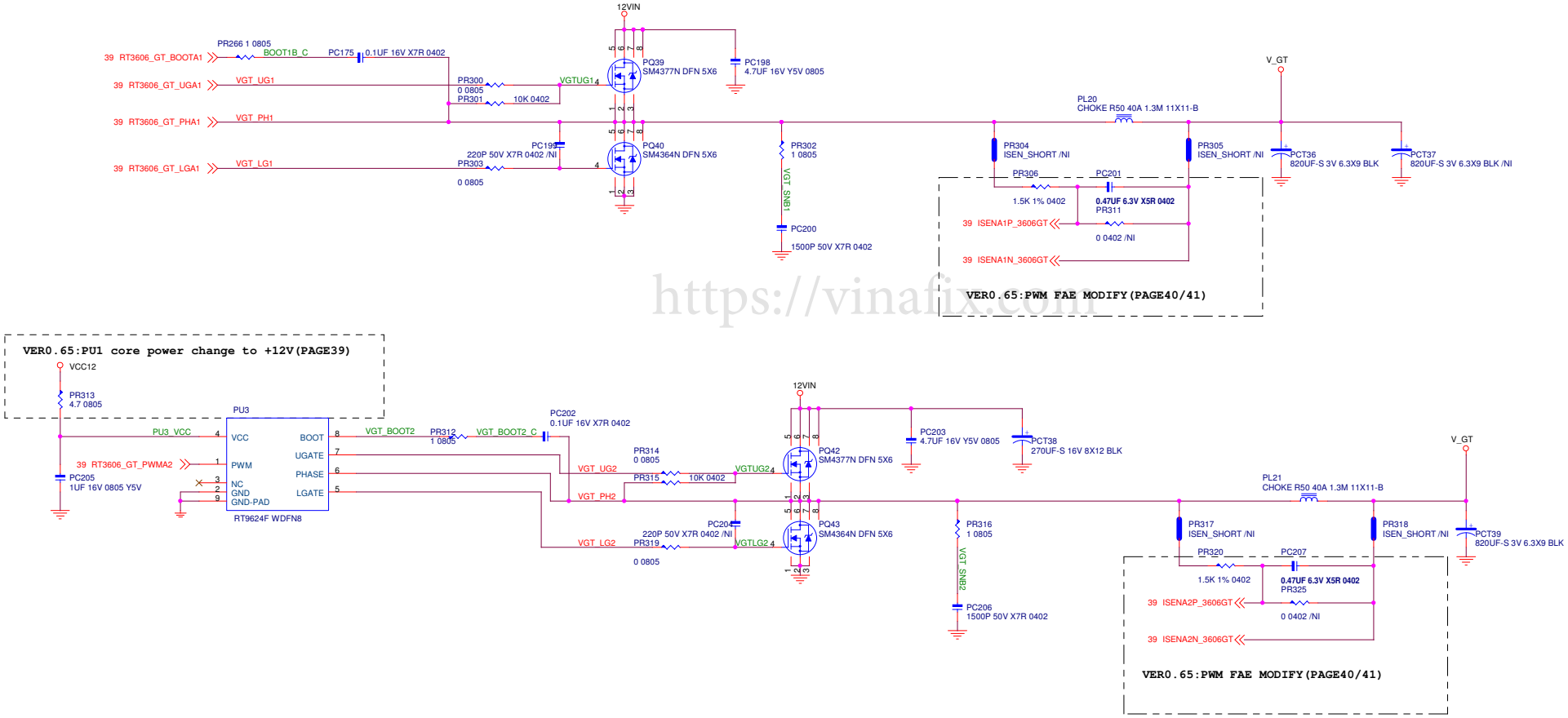
VER0.6:COST DOWN(CPU PWM CHANHE TO RT3606)(PAGE39/40/41)

# *Skylake S-line 42 95W RT3606_VGT*



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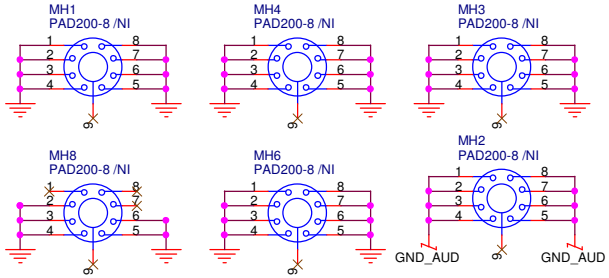


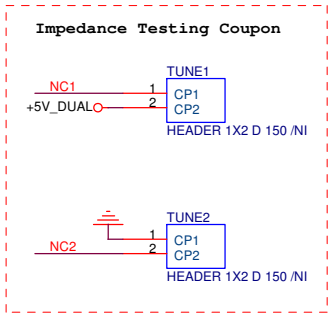


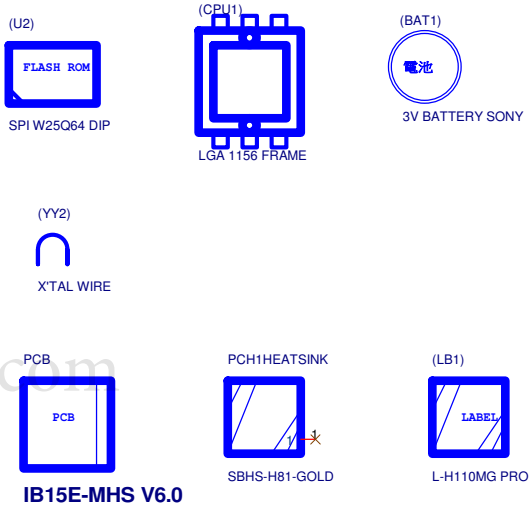




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