

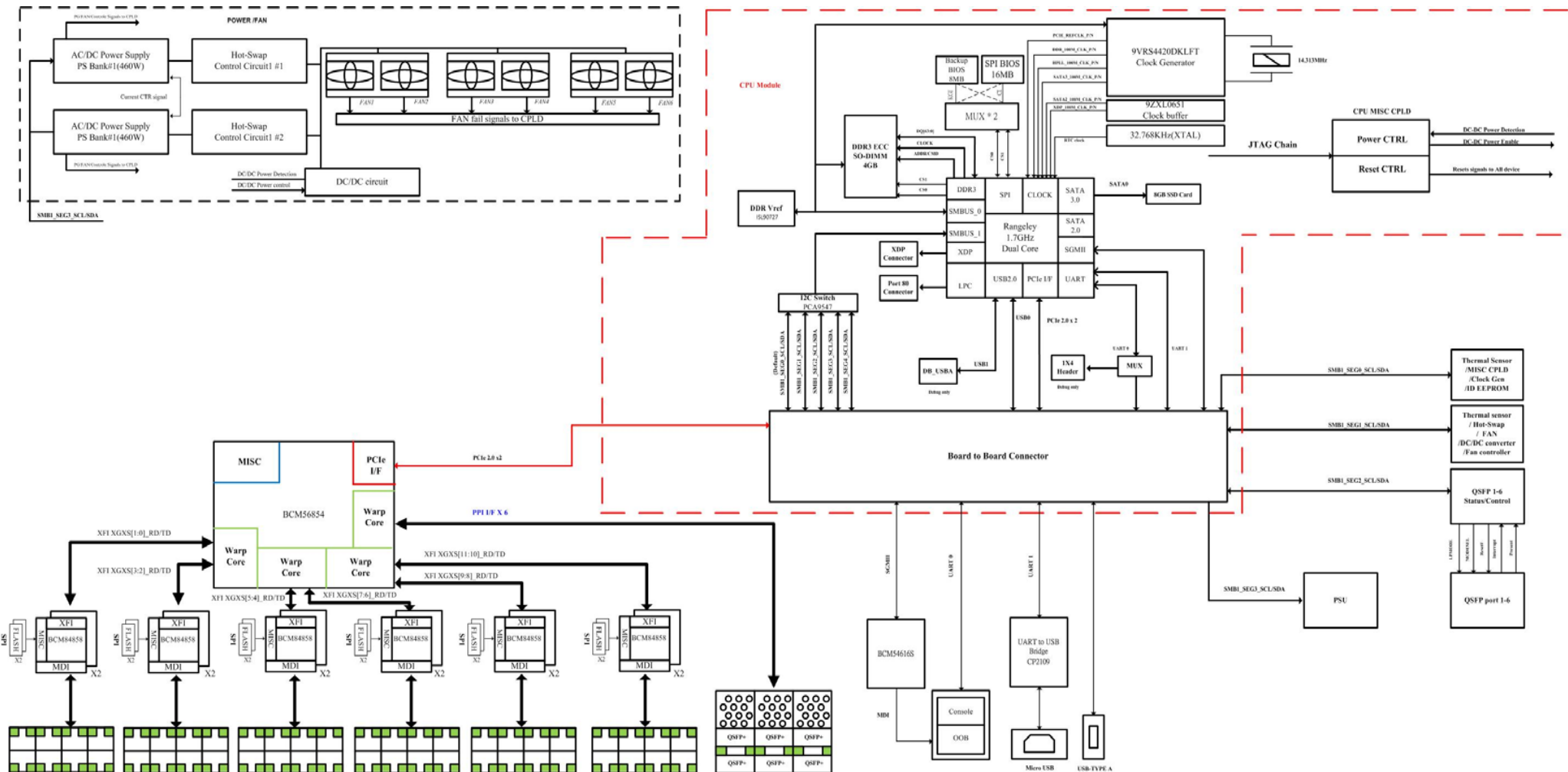
| Revision History | | Date |
|------------------|--|---------------|
| 0.1 | X00 start. | Sep. 20, 2015 |
| 1.1 | PCB Part Number : 2976927201 Add EMI solution, page 86~89 | Feb. 1, 2016 |
| | | |

| Page Descriptions |
|--|
| 01-01_History 01-02_Block Diagram 01-03_Power Consumption 01-04_I2C Tree 01-05_PWR [5V & 2V5 & 3V3A] 01-06_PWR [MAC AVS-1] 01-07_PWR [MAC AVS-2] 01-08_PWR [3V3 & 1V8]_1 01-09_PWR [3V3 & 1V8]_2 01-10_PWR [PHY 1V0 & MAC 1V]_1 01-11_PWR [PHY 1V0 & MAC 1V]_2 01-12_PWR [PHY 1V0A]_3 01-13_PWR [PHY 1V0A]_4 01-14_PWR [CT 1V9]_1 01-15_PWR [CT 1V9]_2 01-16_12V PWR CONN & HOT SWAP 01-17_CLK [25M_156.25M] 01-18_CLK [PHY_156.25M] 01-19_MasterCPLD- LCMXO2-1200 01-20_BCM56864 [MISC_WC28-31] 01-21_BCM56864 [WC0-27] 01-22_BCM56864 [PWR1] 01-23_BCM56864 [PWR2] 01-24_BCM56864 [PWR3] 01-25_BCM56864 [GND] 01-26_Block_PHY 1-6 [L] 01-27_Block_PHY 7-12 [R] 01-28_PHY MISC 01-29_Block_10G RJ-45 [P1-P24] 01-30_Block_10G RJ-45 [P25-P48] 01-31_Block_QSFP+ [P1-P6] 01-32_Port LED decode 01-33_USB& Thermal 01-34_FAN CONN/MGMT/ResetButton 01-35_CPU-Board-IF Connector 01-36_10GBT_LED Array 01-37_QSFP+_LED Array 02-01_BCM84858_PHY_A 02-02_BCM84858_PHY_B 02-03_BCM84858_PHY_C 02-04_BCM84858_PHY_D 03-01_10GBT_RJ-45_2x6 04-01_QSFP CAGE 2x3 |

Note:

- 1.All of resistors are 5%, 0603 SMD except other specified description.
- 2.All of capacitors are 50V except other specified description.
- 3.All of aluminous capacitors are 105 degree C except other specified description.
4. # for LOW active signals(name#)

| SCHEMATICS OF | FILE NAME | DRAWN | DESIGNED | CHECKED | APPROVED | Agema Systems, INC. |
|---------------|-----------|-------|----------|---------|----------|---|
| | | | | | | Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission. |
| | | | | | | File 01-01_History |
| | | | | | | Size C |
| | | | | | | Document Number 1ADSS-0XXXXX |
| | | | | | | Rev 1.1 |
| | | | | | | Date: Tuesday, September 13, 2016 Sheet 1 of 80 |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

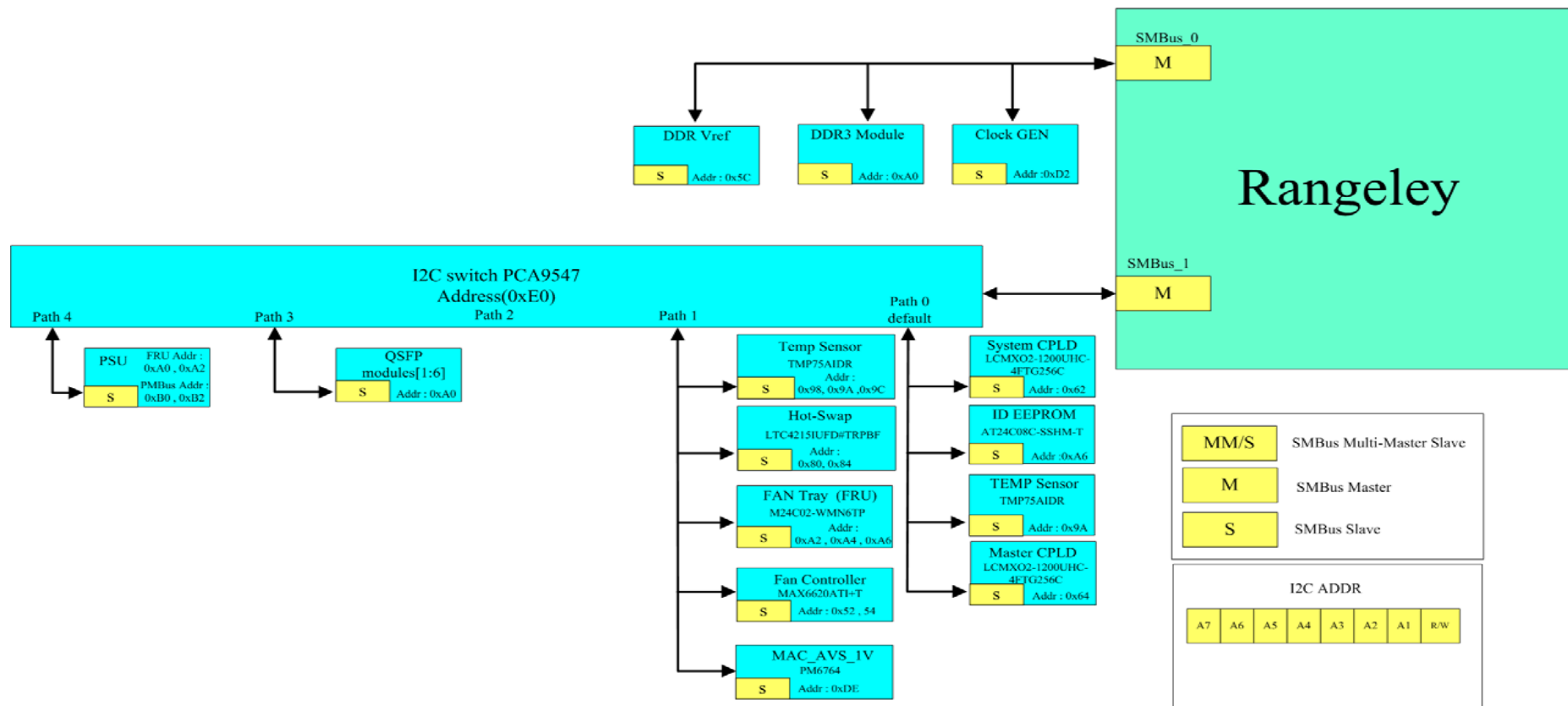
| | | | |
|-------|-----------------------------|-------|---------|
| File | 01-02_Block Diagram | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 2 of 80 |

| Power Dissipations of S4048C | | | | | | | | | | | | | | | | | | | | | | | | | | |
|---|--|---------------|---------|--------|-------------|--------------|------|------|-------|------|------|------|-----|--------|--------|-------|------|------|-------|------|-------|-------|-------|-------|-------|----------|
| Device | Qty | (mA) | | | | | | | | | | | | (mA) | | | | | | | | | | | | subtotal |
| | | VFTS 0.75V | IMAC 1V | AVS 1V | CPU 1.0V | CPU 1.07V | VCCP | 1.35 | 1.5 | 1.6V | 1.9V | 3.3V | 12V | 0.75 | 1.03 | 1.03 | 1 | 1.07 | 1.3 | 1.35 | 1.5 | 1.8 | 1.9 | 3.3 | 12 | |
| C2338 (Rangeley) | 1 | | | | 6200 | 1800 | 8200 | 200 | 3000 | 200 | | 160 | | 0 | 0 | 0 | 6200 | 1800 | 8200 | 200 | 3000 | 200 | 0 | 160 | 0 | 24.44 |
| SVR54420DKLFT | 1 | | | | | | | | 45 | | | 28 | | 0 | 0 | 0 | 0 | 0 | 0 | 45 | 0 | 0 | 28 | 0 | 0 | 0.16 |
| 8G SSD | 1 | | | | | | | | | | | 390 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 390 | 0 | 0 | 1.29 |
| BCM56864 | 1 | | 7260 | 68930 | | | | | | | | 600 | | 0 | 7260 | 68930 | 0 | 0 | 0 | 0 | 0 | 0 | 600 | 0 | 0 | 80.46 |
| BCM84858 | 12 | | 8320 | | | | | | | 840 | 1000 | | | 0 | 99840 | 0 | 0 | 0 | 0 | 0 | 0 | 10080 | 12000 | 0 | 0 | 143.779 |
| DDR3-DRAM | 1 | 6.66 | | | | | | | 353.2 | | | | | 6.66 | 0 | 0 | 0 | 0 | 0 | 0 | 353.2 | 0 | 0 | 0 | 0 | 0.535 |
| BIOS | 1 | | | | | | | | | | | 25 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 25 | 0 | 0 | 0.08 |
| LCMX02 | 2 | | | | | | | | | | | 22.1 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 44.2 | 0 | 0 | 0.15 |
| LED | 132 | | | | | | | | | | | 31 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 4092 | 0 | 0 | 13.50 |
| QSFP (3.5W) | 6 | | | | | | | | | | | 1060 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 6360 | 0 | 0 | 20.99 |
| FAN | 6 | | | | | | | | | | | 750 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 4500 | 0 | 54.00 |
| Others (ICs ,OSCs ... etc) | 1 | | | | | | | | | | | 384 | | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 384 | 0 | 0 | 1.27 |
| Load Total Current per Voltage [A]: | | | | | | | | | | | | | | 0.01 | 107.10 | 68.93 | 6.20 | 1.80 | 8.20 | 0.20 | 3.40 | 10.28 | 12.00 | 12.08 | 4.50 | |
| Load Power Dissipation per Voltage [W]: | | | | | | | | | | | | | | 0.00 | 110.31 | 71.00 | 6.20 | 1.93 | 10.66 | 0.27 | 5.10 | 18.50 | 22.80 | 39.87 | 54.00 | 340.65 |
| PVM/LDO Efficiency(%): | | | | | | | | | | | | | | 0.70 | 0.85 | 0.85 | 0.87 | 0.86 | 1.00 | 1.00 | 0.87 | 0.84 | 1.00 | 0.93 | 1.00 | |
| +12 Output Watt(Po): | | | | | | | | | | | | | | 0.01 | 129.78 | 83.72 | 7.13 | 2.24 | 10.66 | 0.27 | 5.86 | 22.03 | 22.80 | 42.88 | 54.00 | 381.37 |
| 460W AC PSU | Total power consumption included 90% de-rating of AC/DC PSU [W]: | | | | | | | | | | | | | 423.74 | | | | | | | | | | | | |
| | Max AC current at 100V AC, PF = 0.998 | | | | | | | | | | | | | 4.25 | | | | | | | | | | | | |
| | Max AC current at 240V AC, PF = 0.987 | | | | | | | | | | | | | 1.79 | | | | | | | | | | | | |

Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

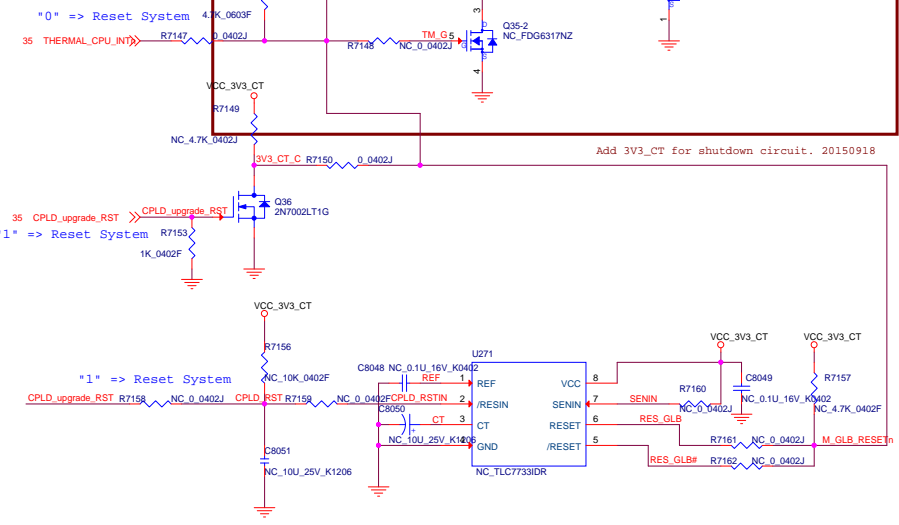
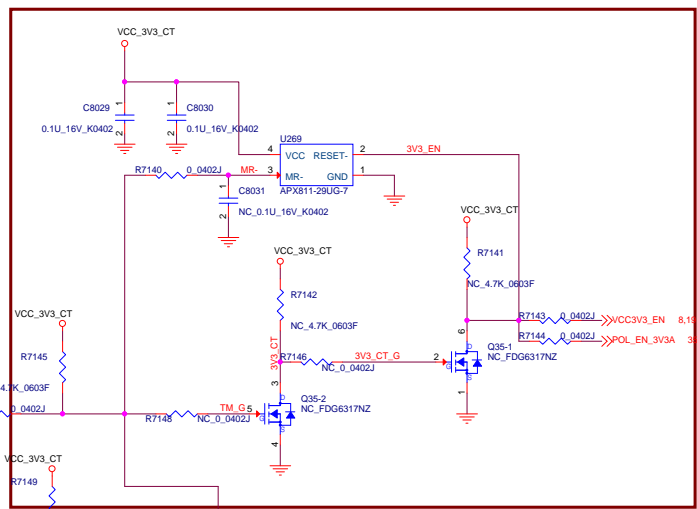
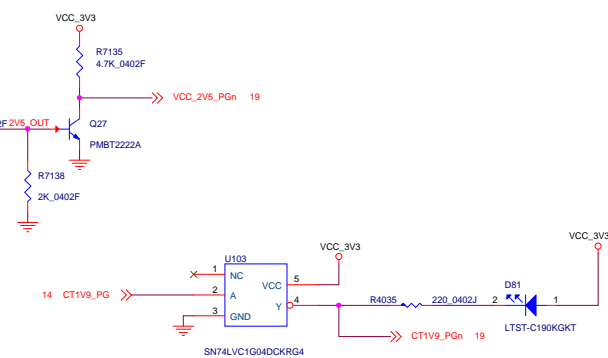
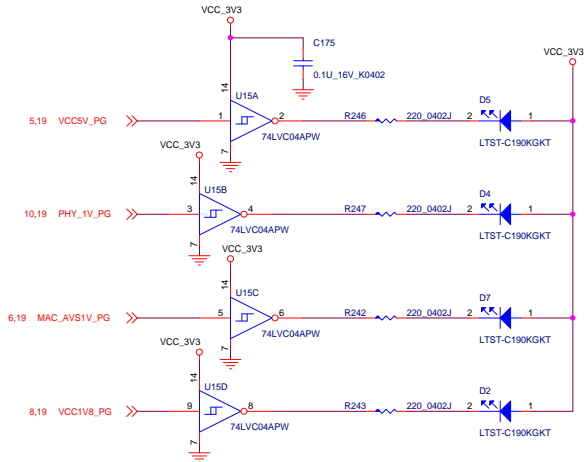
| | | |
|-------------------------|-----------------------------|---------------|
| 01-03_Power Consumption | | |
| Size | Document Number | Rev |
| C | 1ADSS-0XXXXX | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 3 of 80 |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

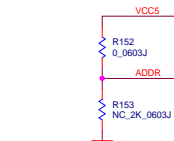
| | | |
|----------------|-----------------------------|---------------|
| 01-04_I2C Tree | | |
| Size | Document Number | Rev |
| C | 1ADSS-0XXXXX | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 4 of 80 |



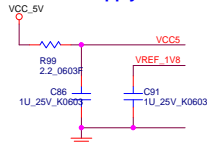
| | | | |
|--|-----------------------------|-------|---------|
| <h1 style="text-align: center;">Agema Systems, INC.</h1> | | | |
| <p>Confidentiality Statement: The pages herein, together and individually are the sole property & product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any manner without explicit written permission.</p> | | | |
| <p>Title 01-05_PWR [5V]</p> | | | |
| Size | Document Number | | Rev |
| | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 5 of 90 |

PIN Strapping

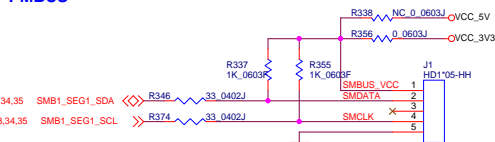
ADDR:0x08 for device



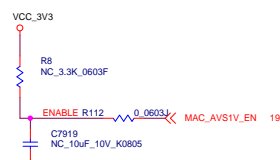
IC Power Supply



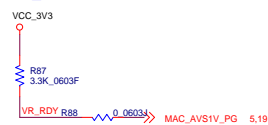
PMBUS



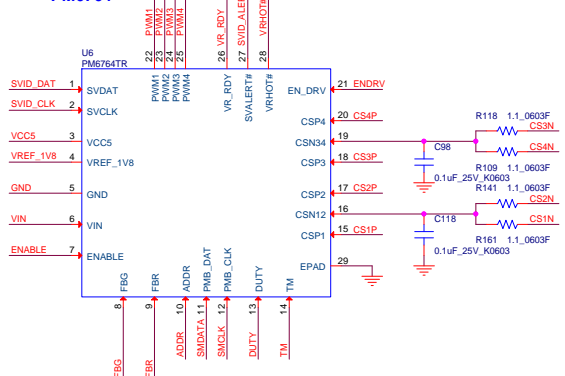
ENABLE



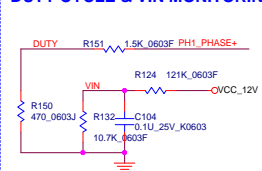
VR_RDY



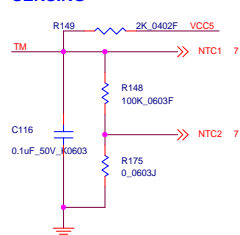
PM6764



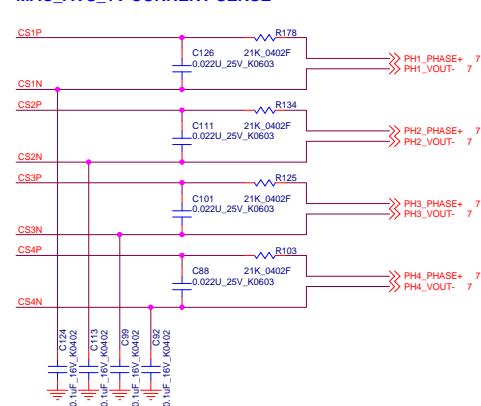
DUTY CYCLE & VIN MONITORING



THERMAL SENSING



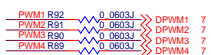
MAC_AVS_1V CURRENT SENSE



SVID BUS(25MHz!!) & VRHot/PROHot

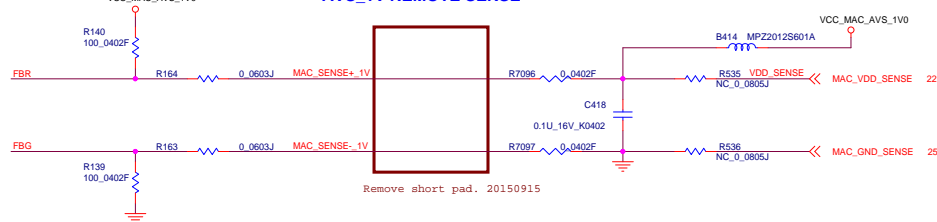


PWM to DRV's Connections



NOTE: always provide PWM/ENDRV pins testpoint

AVS_1V REMOTE SENSE



NOTE: R2 and R40 resistor should be placed close to MAC_AVS_1V
Decoupling Inductor Section
R6 and R14 resistors should be placed close to VSS_MAC_AVS_1V

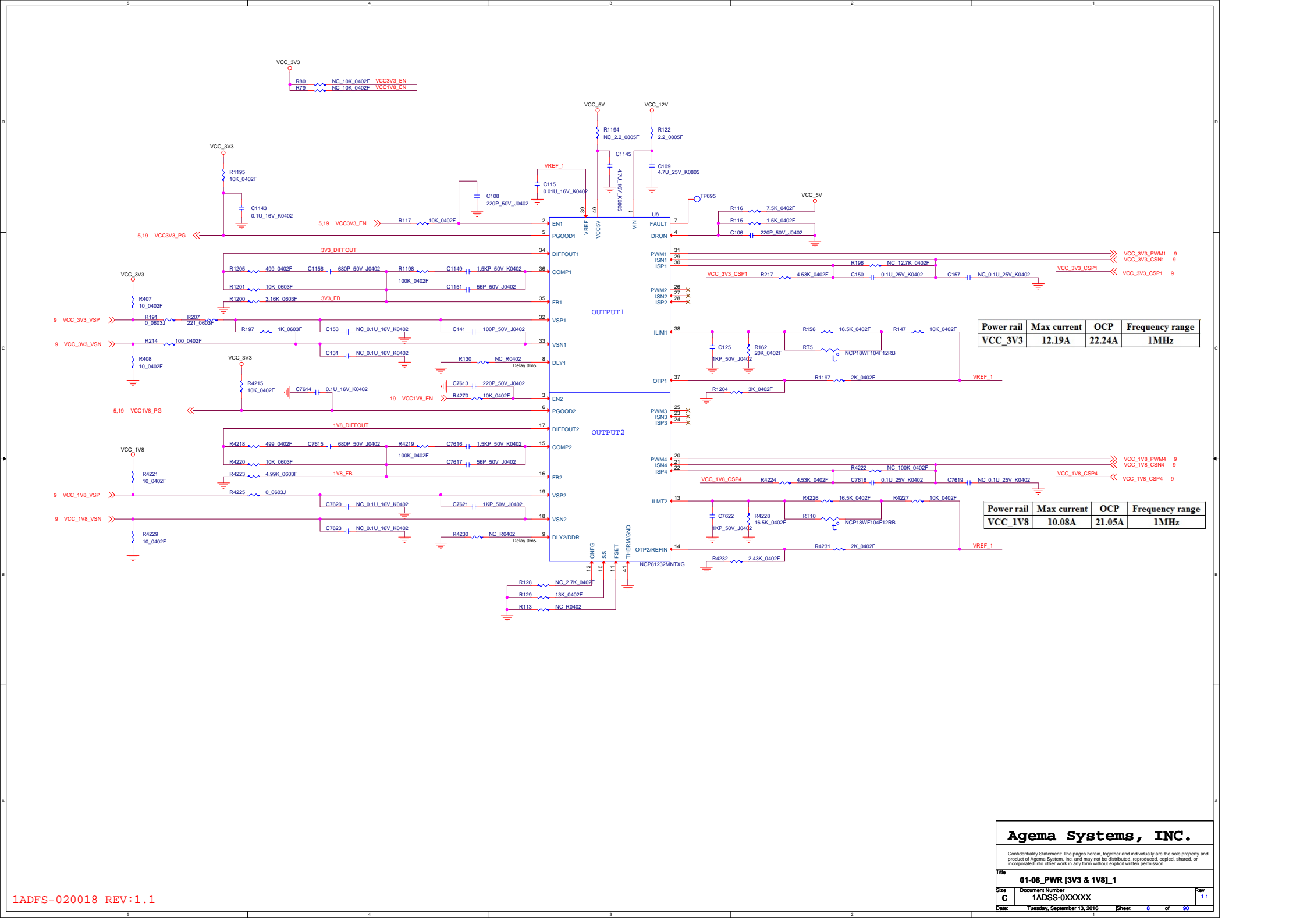
Routing with differential trace 10/10/10

Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | |
|-------|-----------------------------|
| File | 01-06_PWR [MAC AVS-1] |
| Size | Document Number |
| C | 1ADSS-0XXXXX |
| Date: | Tuesday, September 13, 2016 |
| Sheet | 6 of 80 |
| Rev | 1.1 |





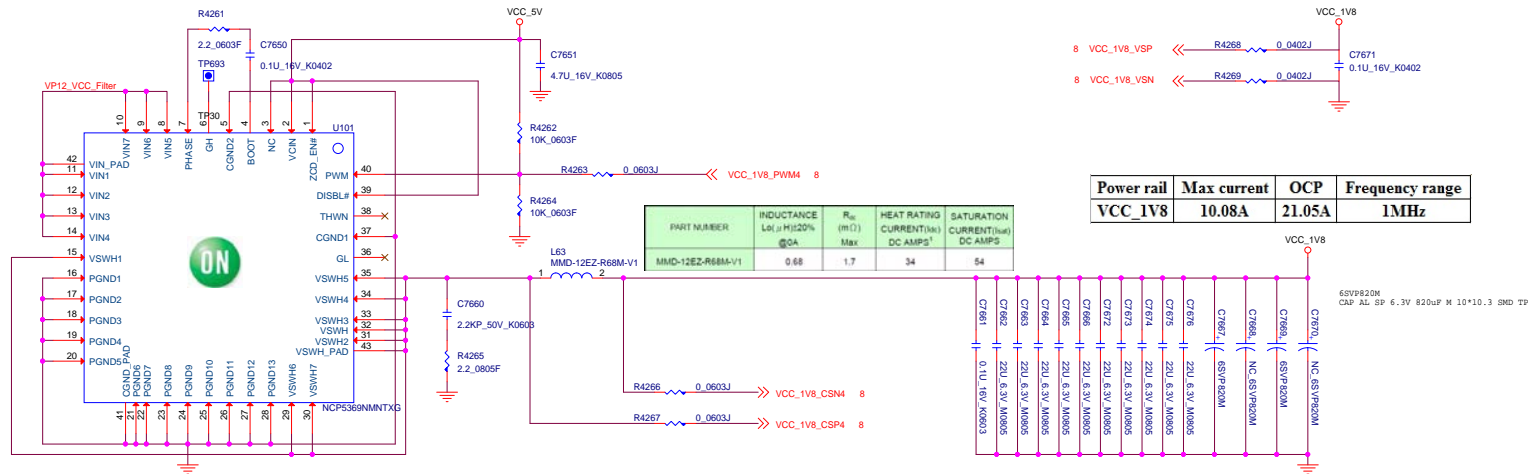
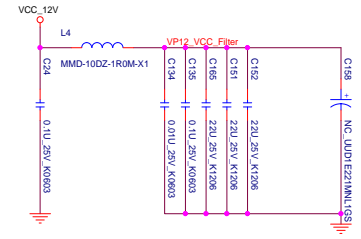
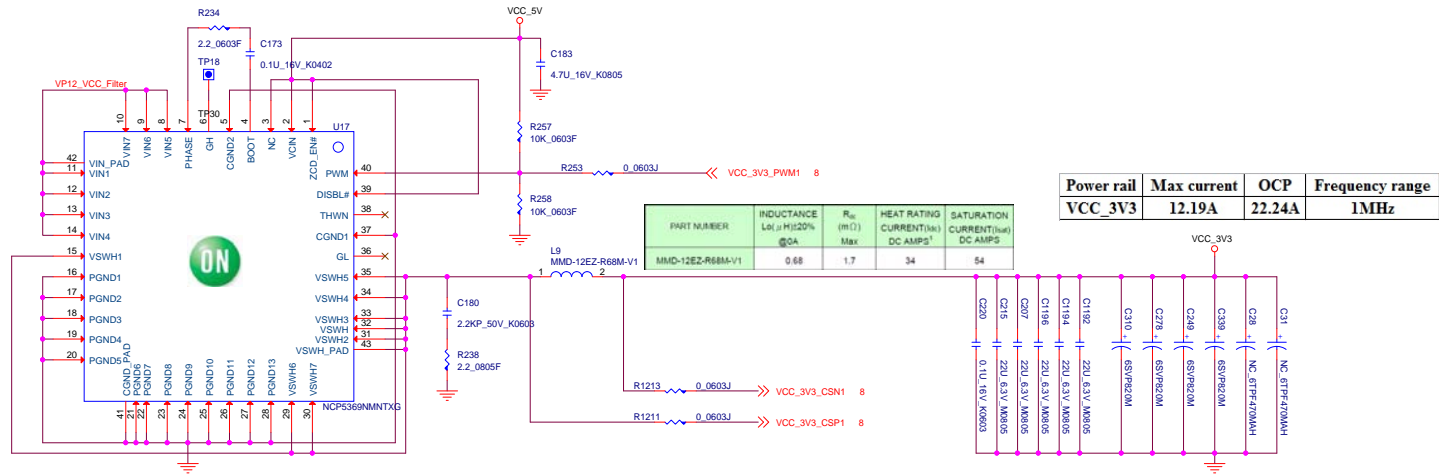
| Power rail | Max current | OCP | Frequency range |
|------------|-------------|--------|-----------------|
| VCC_3V3 | 12.19A | 22.24A | 1MHz |

| Power rail | Max current | OCP | Frequency range |
|------------|-------------|--------|-----------------|
| VCC_1V8 | 10.08A | 21.05A | 1MHz |

Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

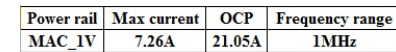
| | | | |
|-------|-----------------------------|--------------|---------|
| File | 01-06_PWR [3V3 & 1V8]_1 | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev |
| C | | | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet | 8 of 80 |

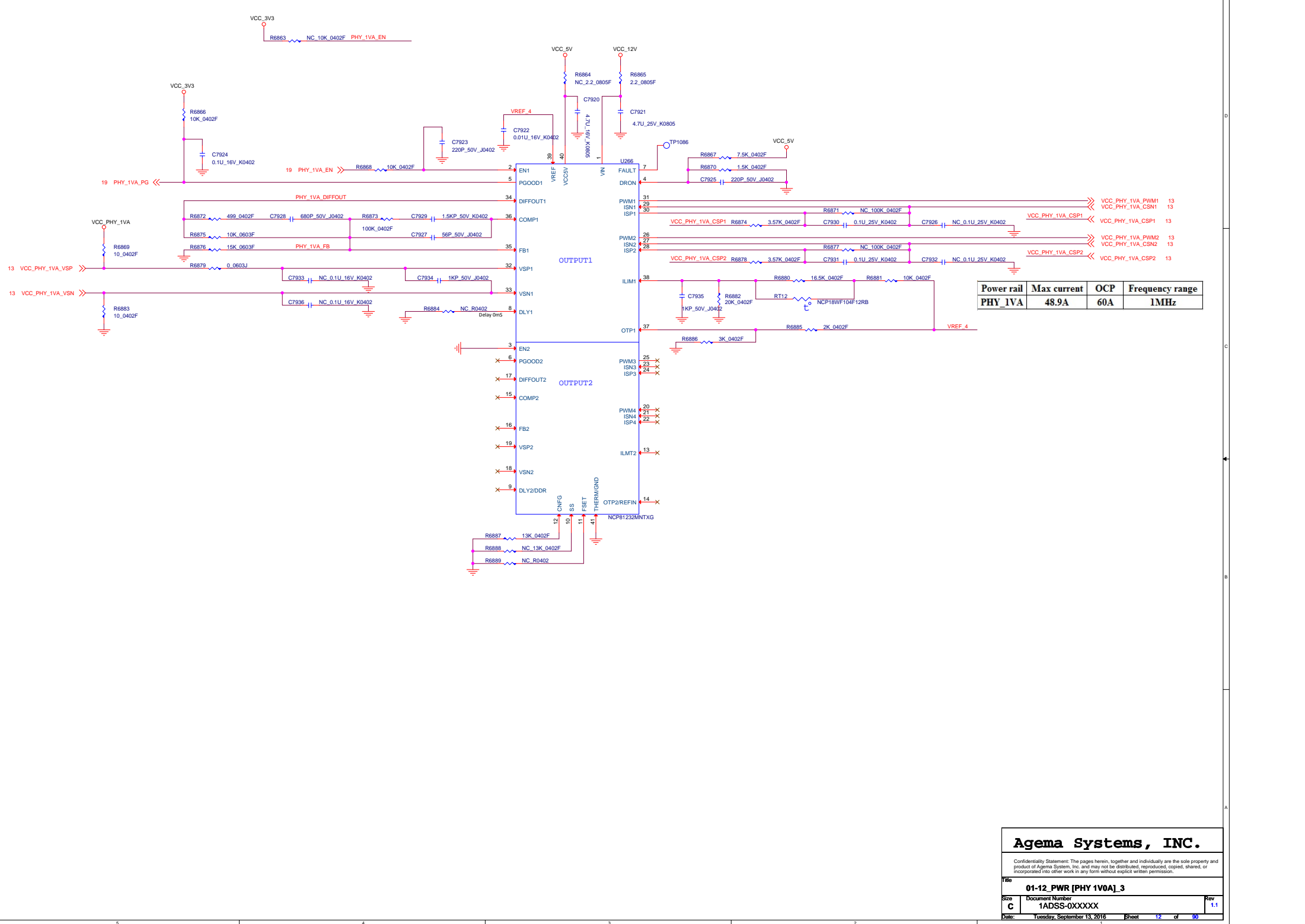


Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | |
|-------|-----------------------------|---------------|
| File | 01-09_PWR [3V3 & 1V8] 2 | |
| Size | Document Number | Rev |
| C | 1ADSS-0XXXXX | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 8 of 80 |



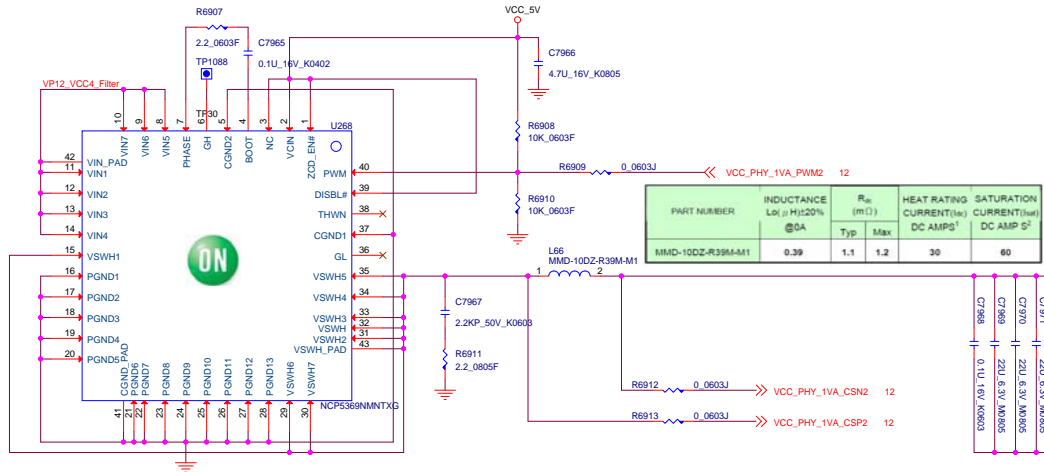
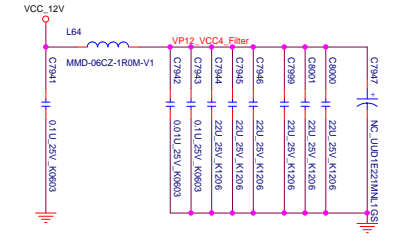
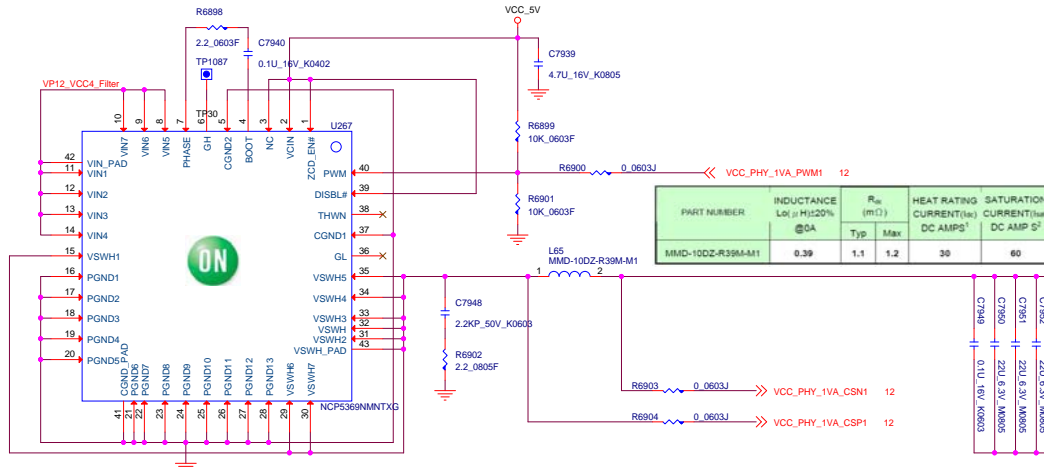


| Power rail | Max current | OCp | Frequency range |
|------------|-------------|-----|-----------------|
| PHY_1VA | 48.9A | 60A | 1MHz |

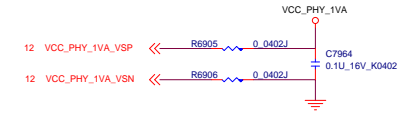
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 01-12_PWR [PHY 1V0A]_3 | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 12 of 80 |



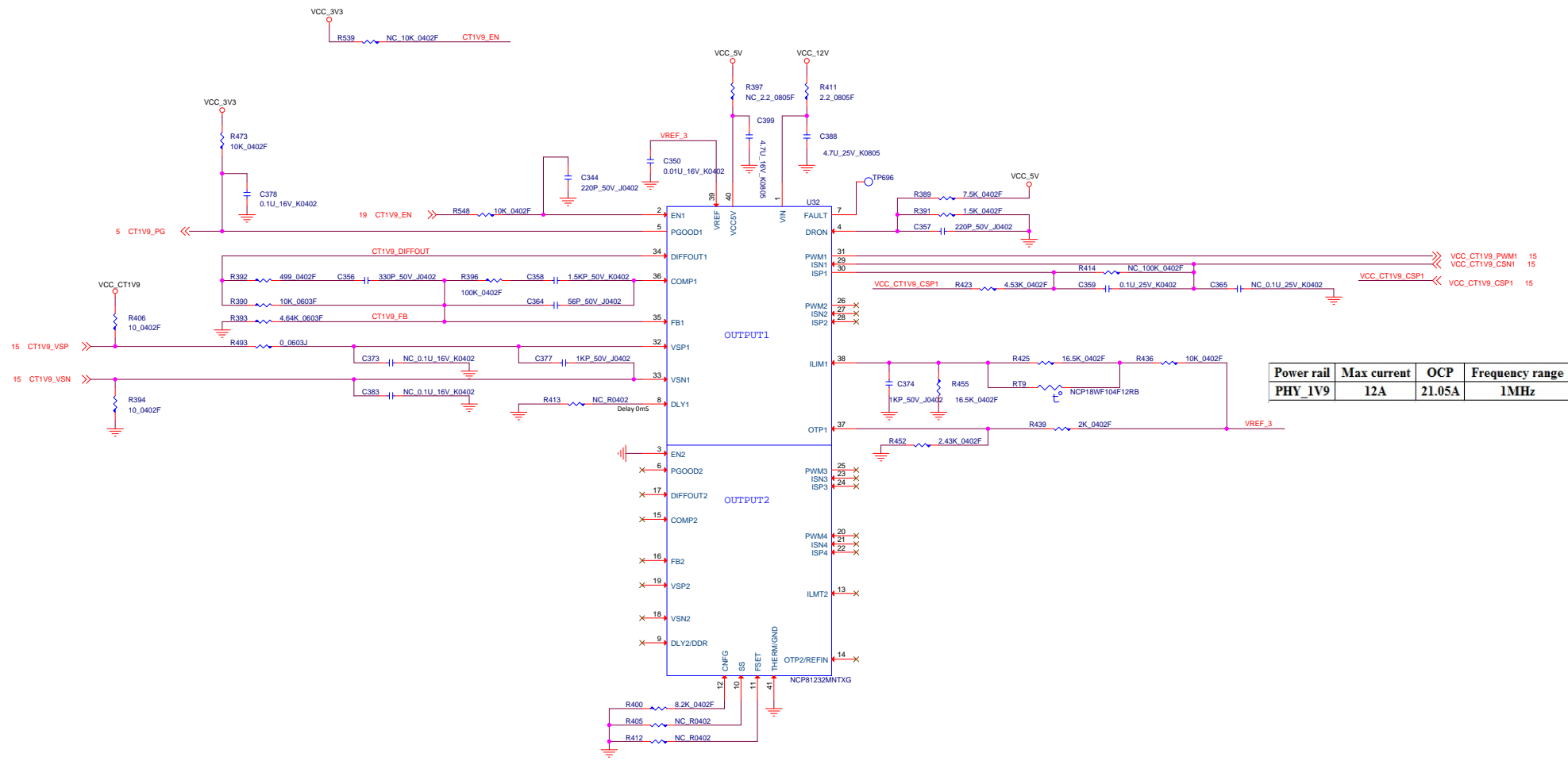
| Power rail | Max current | OCP | Frequency range |
|------------|-------------|-----|-----------------|
| PHY_1VA | 48.9A | 60A | 1MHz |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|------|------------------------|-----------------------------|----------------|
| File | 01-13_PWR [PHY 1V0A] 4 | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Date: | Tuesday, September 13, 2016 | Sheet 13 of 80 |

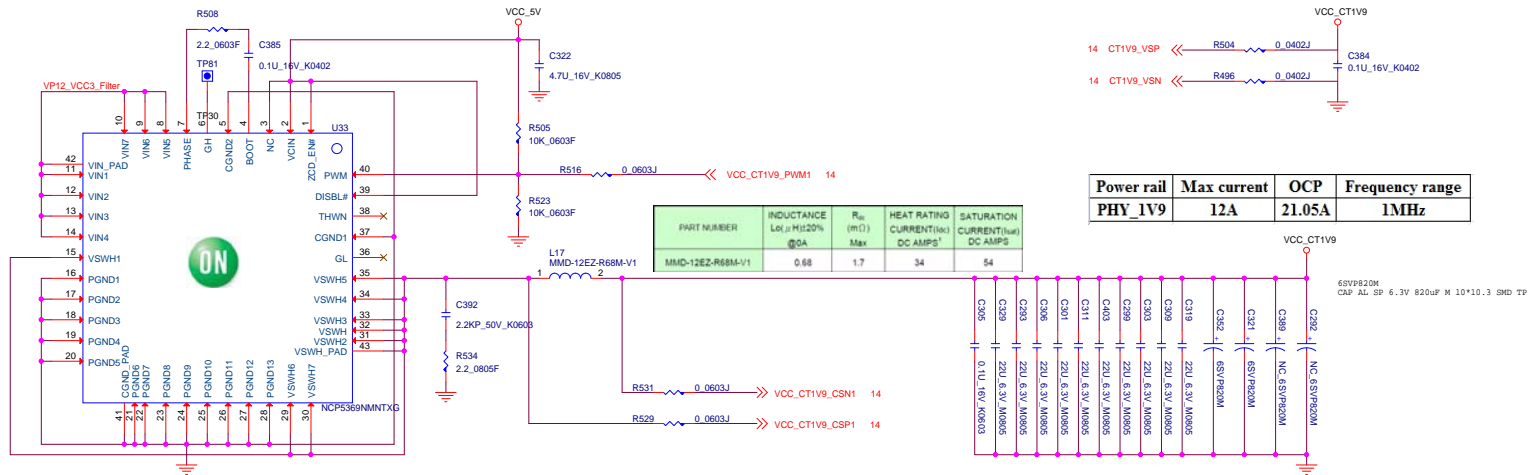


| Power rail | Max current | OCV | Frequency range |
|------------|-------------|--------|-----------------|
| PHY_1V9 | 12A | 21.05A | 1MHz |

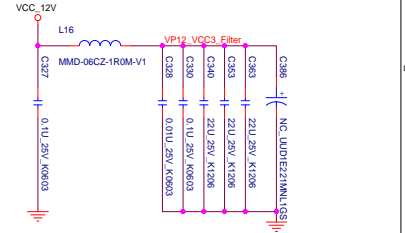
Agema Systems, INC.

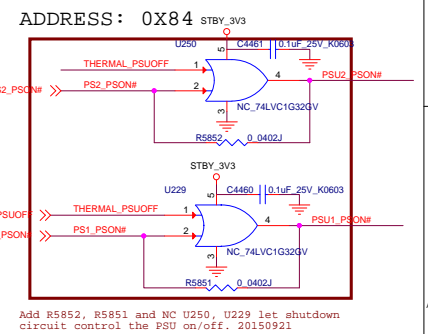
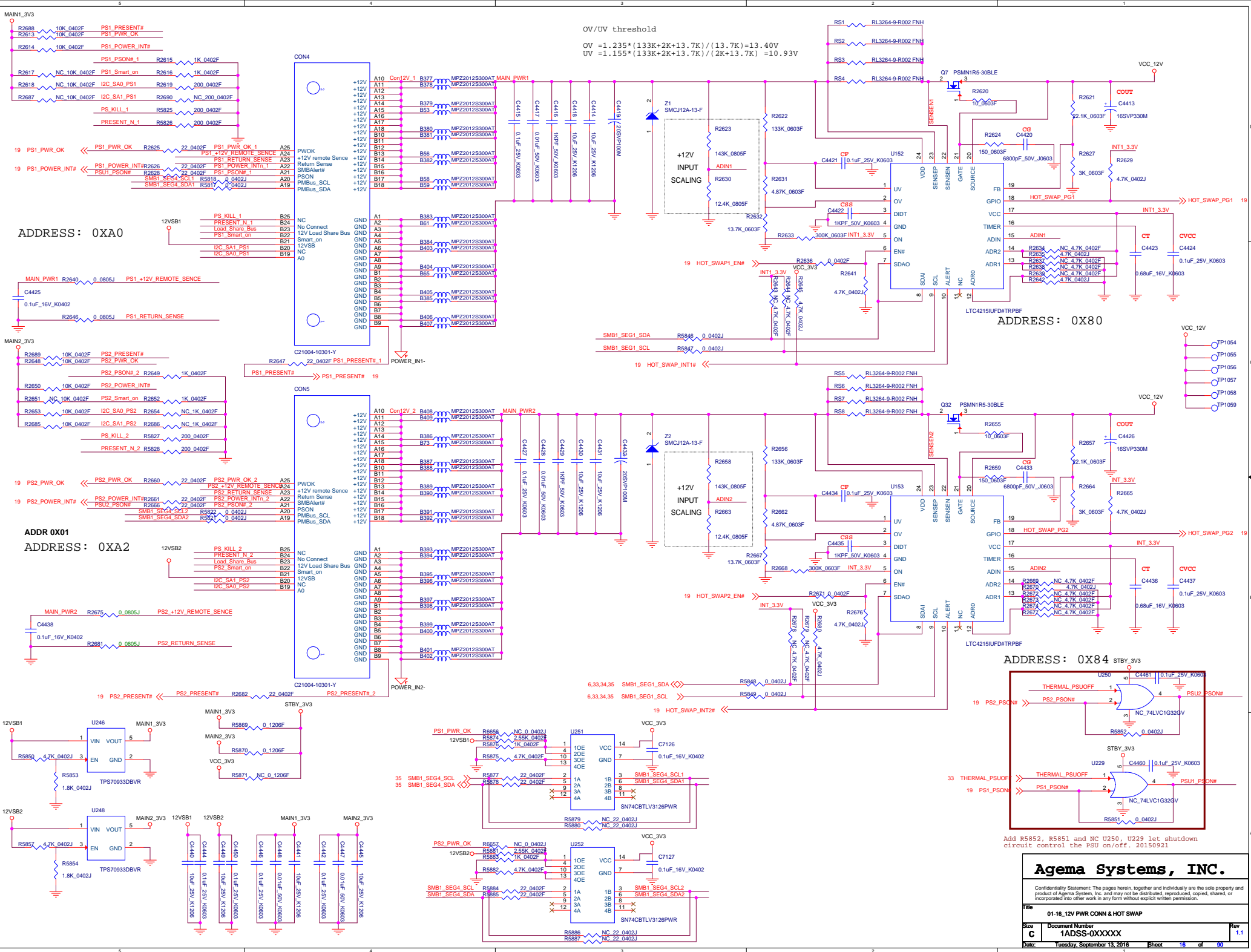
Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 01-12_PWR [CT 1V9]_1 | Rev | 1.1 |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 14 of 80 |



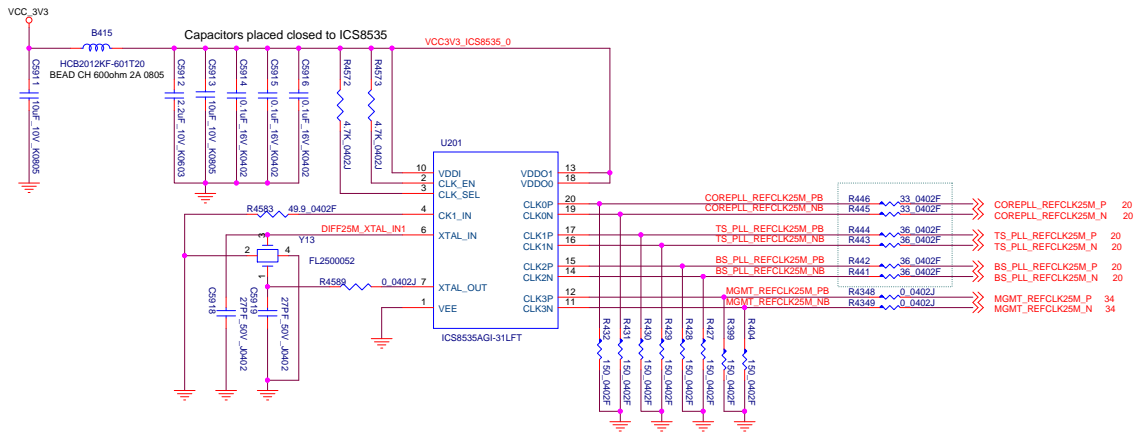
| Power rail | Max current | OCF | Frequency range |
|------------|-------------|--------|-----------------|
| PHY_1V9 | 12A | 21.05A | 1MHz |



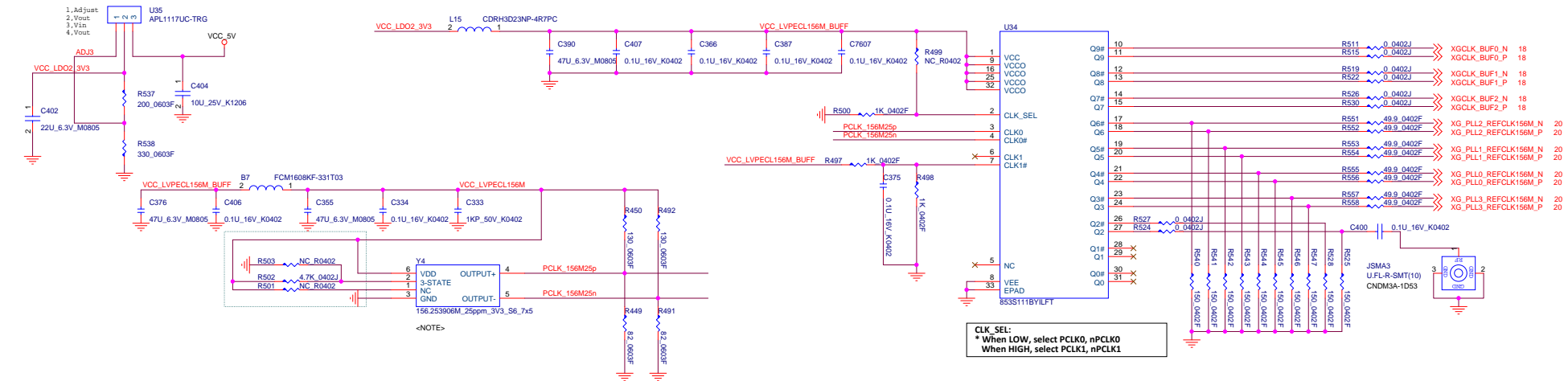


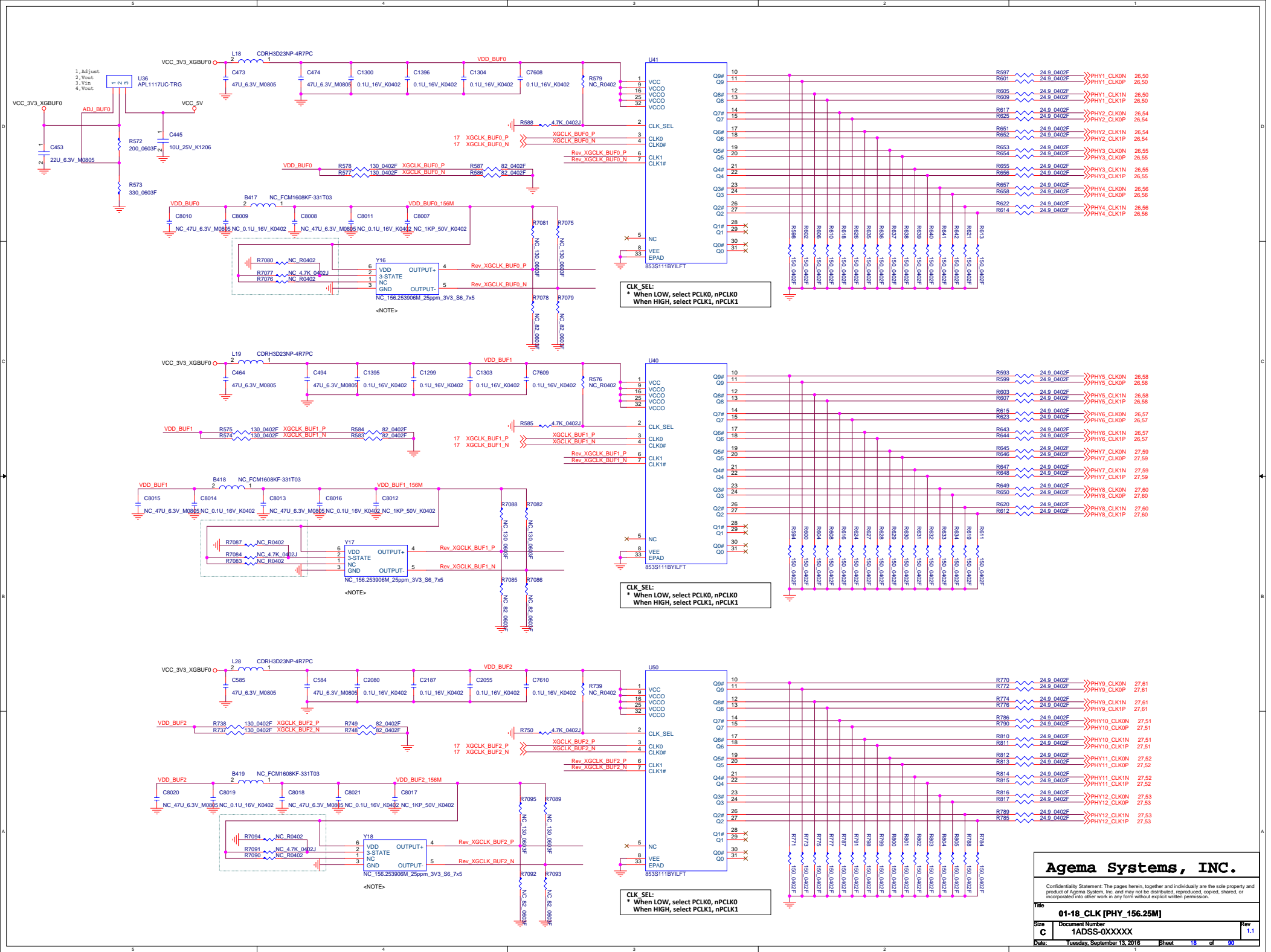
Add R5852, R5851 and NC U250, U229 let shutdown circuit control the PSU on/off. 20150921

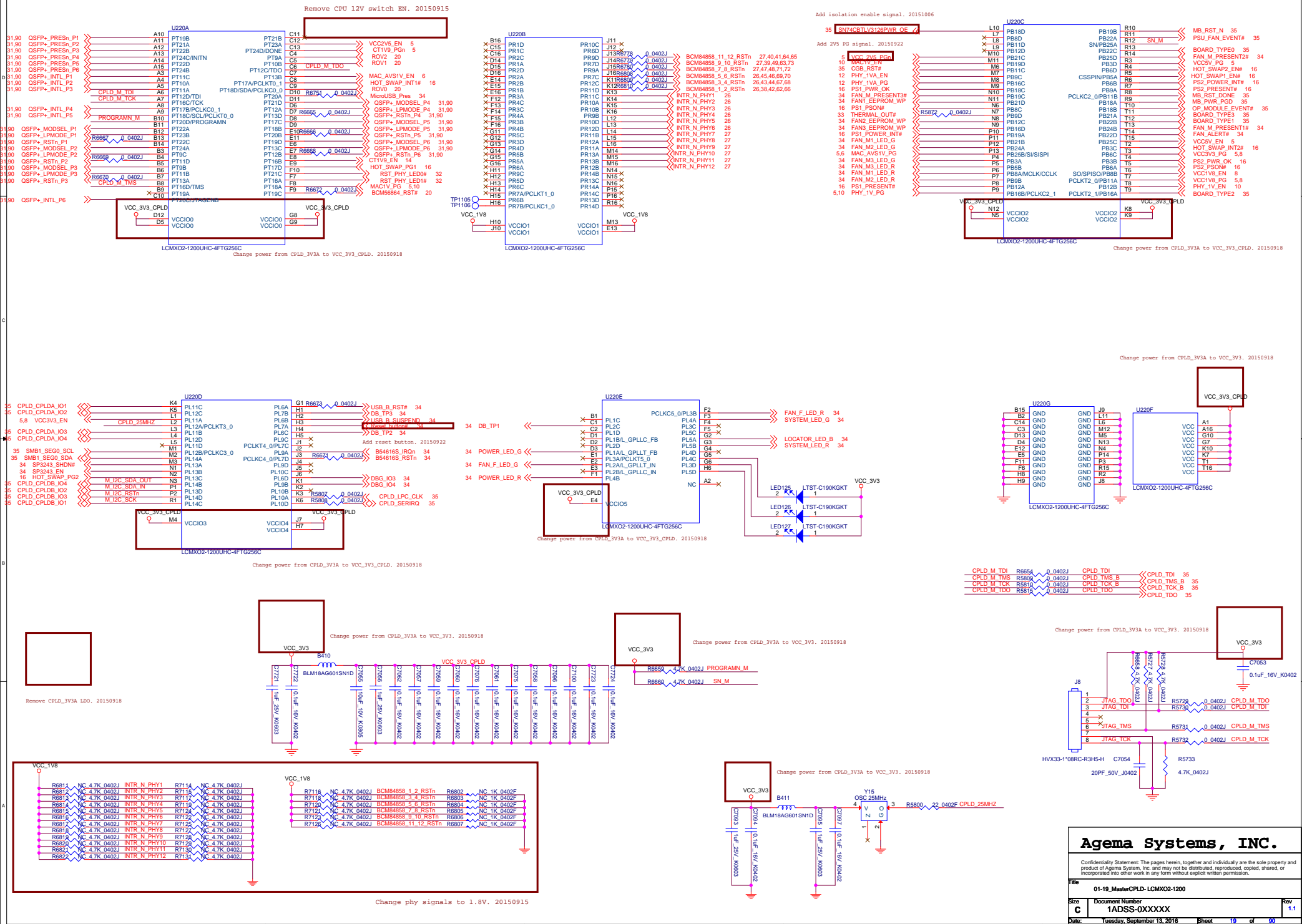
25MHz Differential Clock for BCM56850 Core Clock

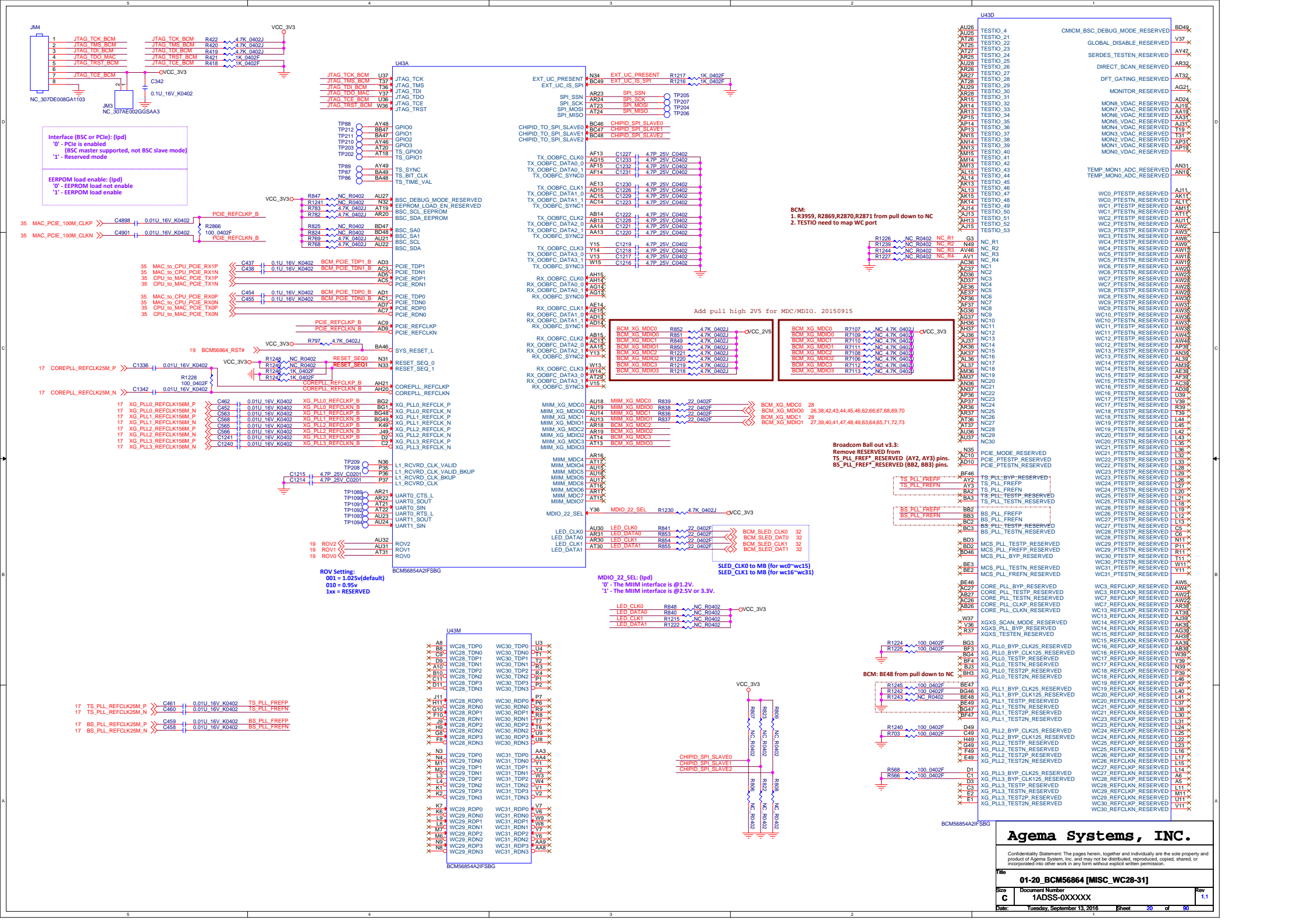


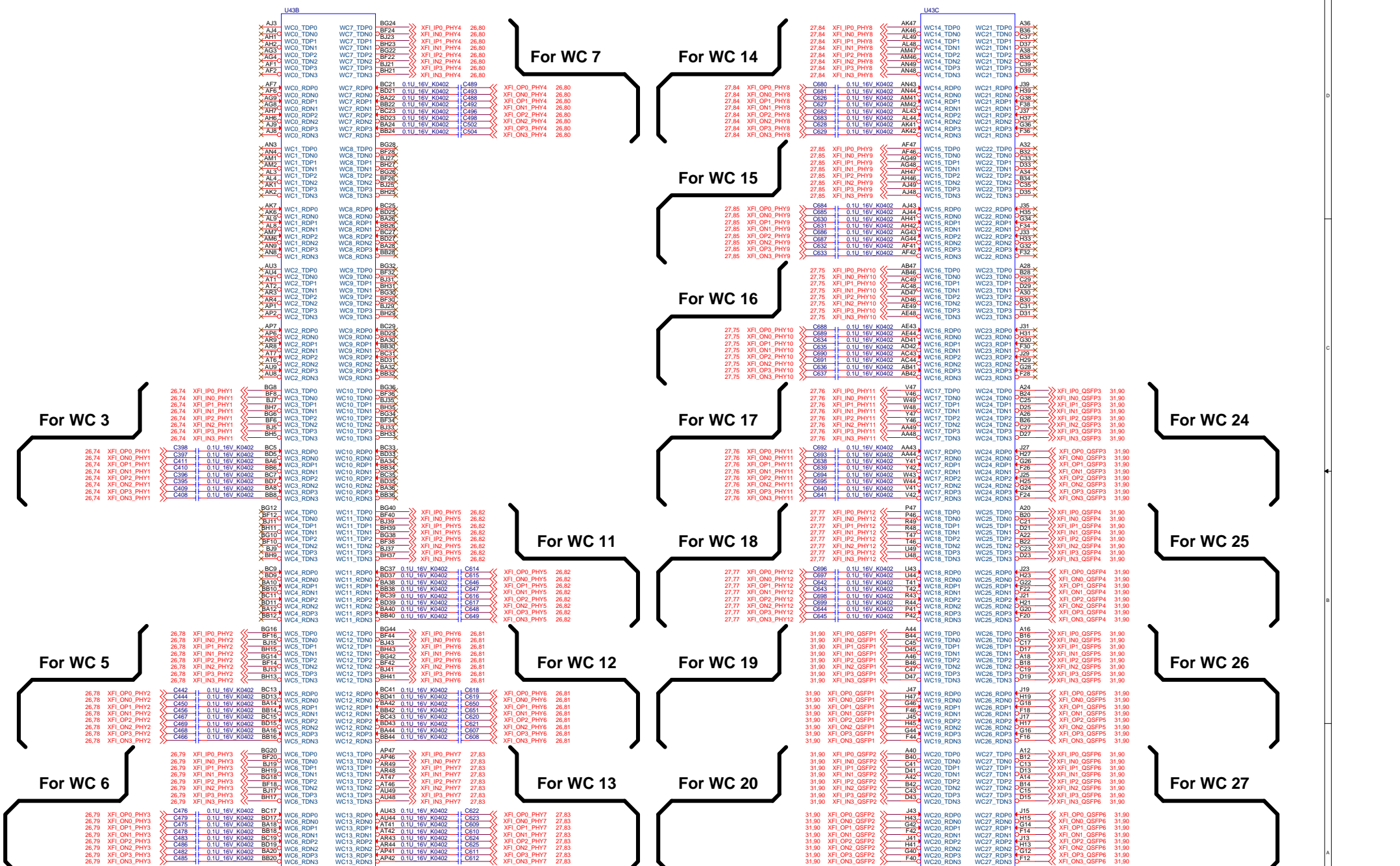
156.25MHz Differential Clock for BCM56850







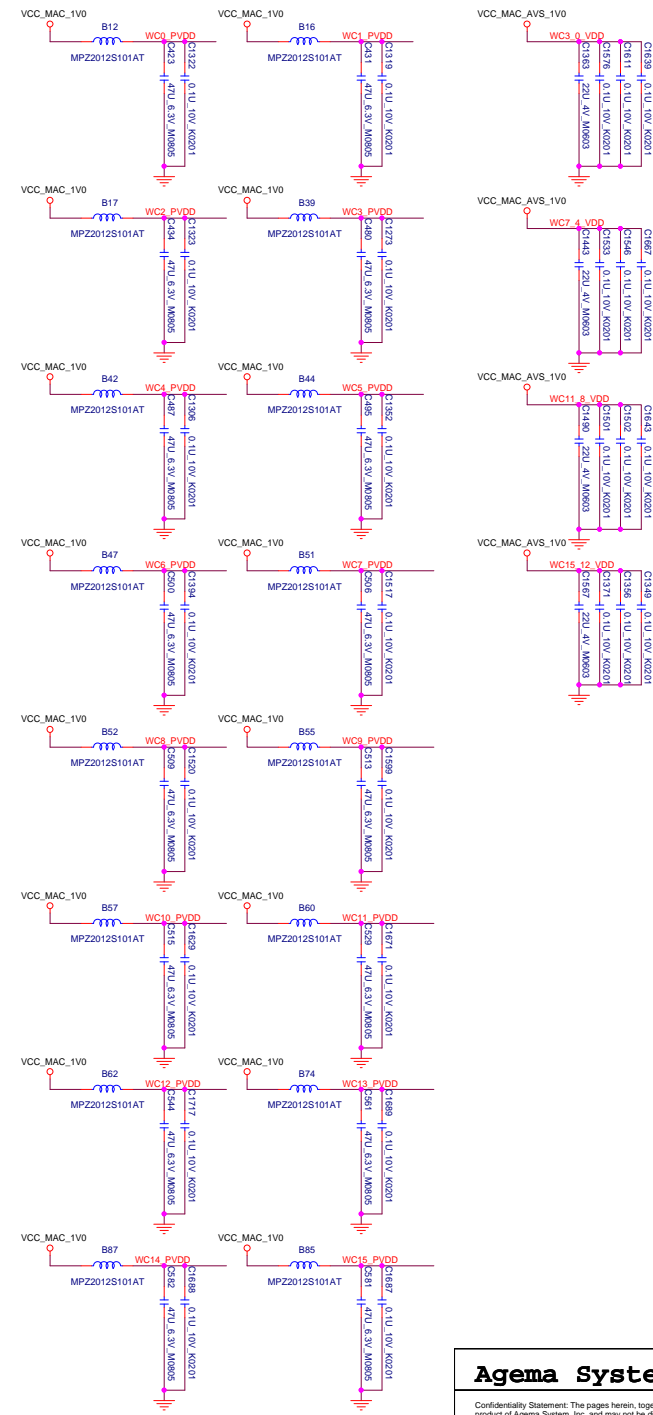
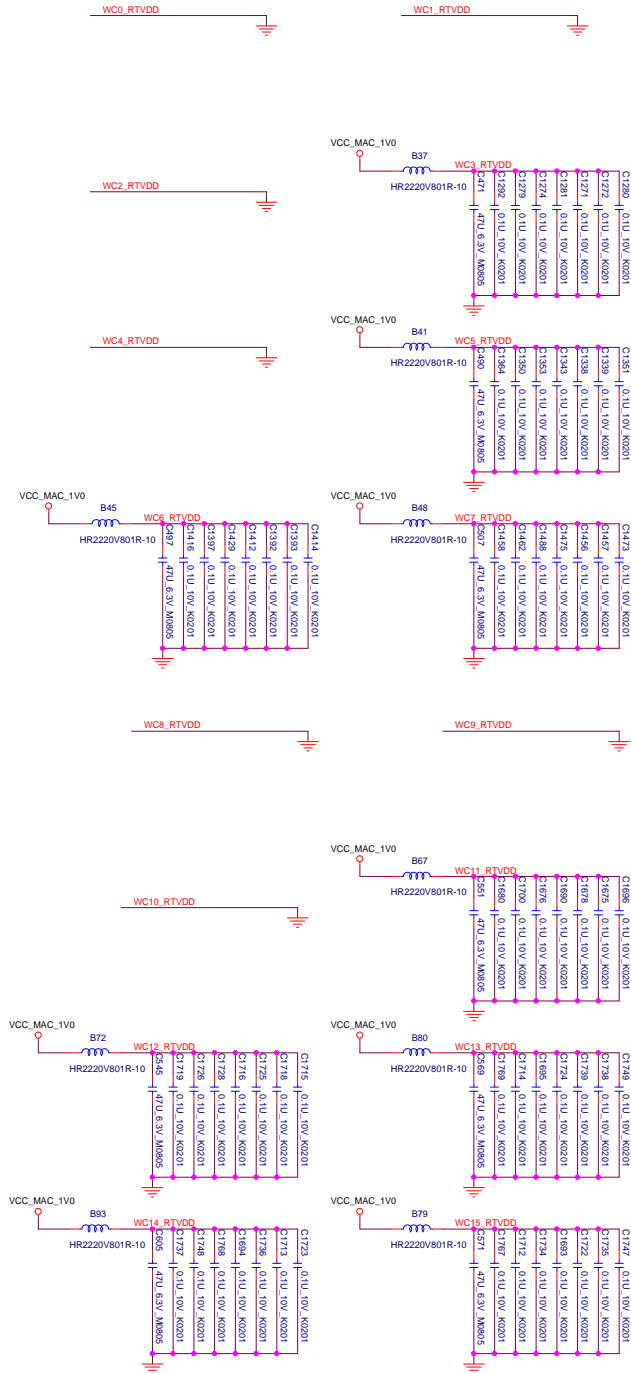
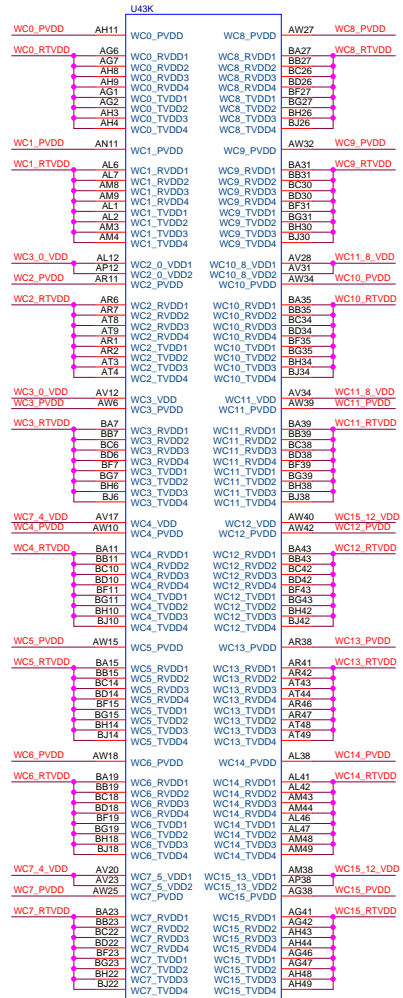


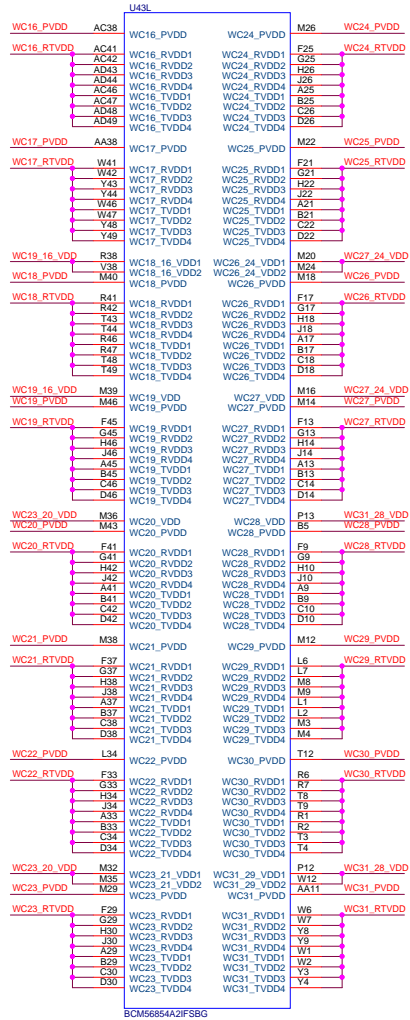


Checklist need 800ohm / 1A

Checklist need 100ohm / 500mA

Broadcom Ball out v3.1:
Correct I/O type from GND to PWR for WC11_VDD pin.

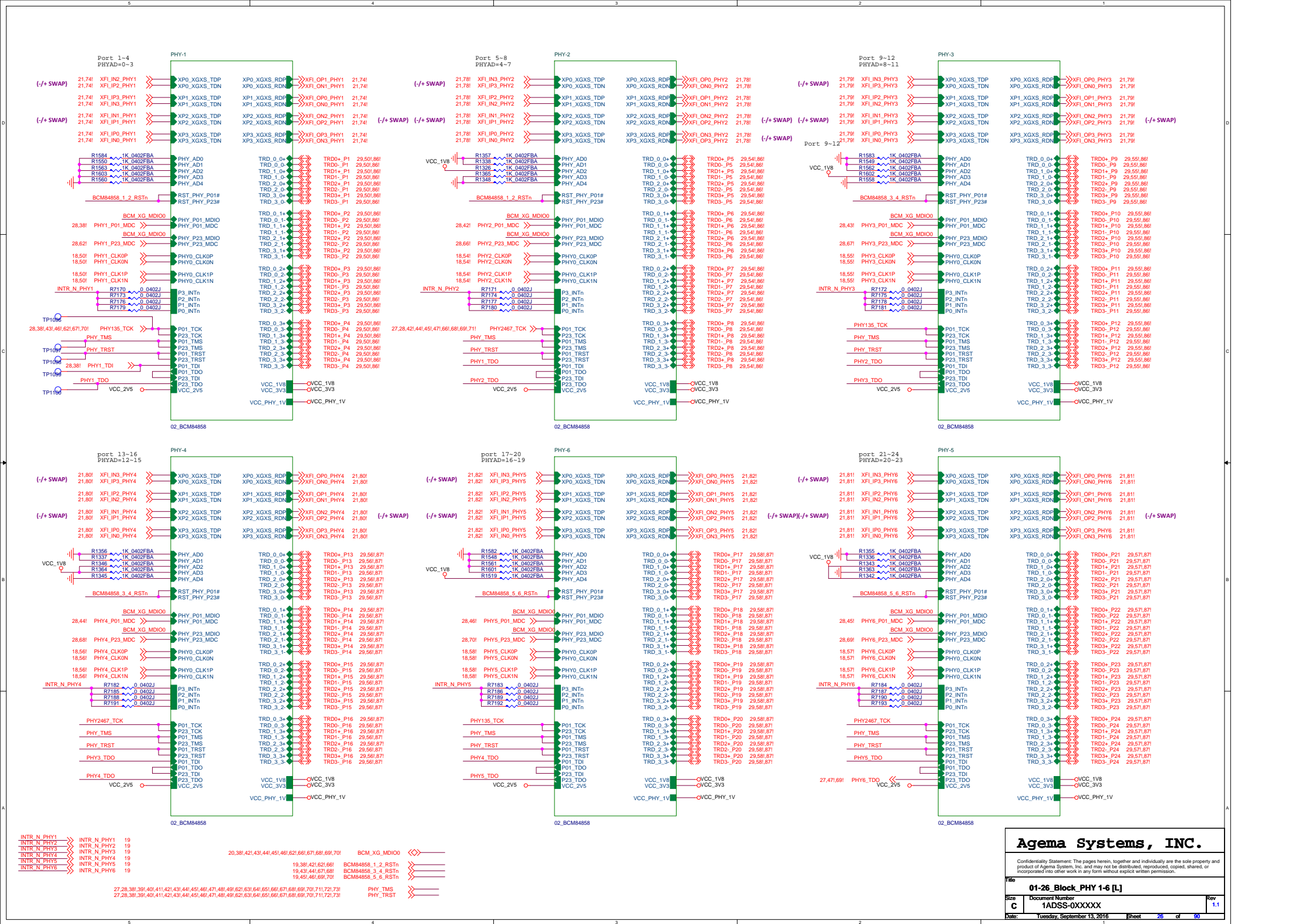


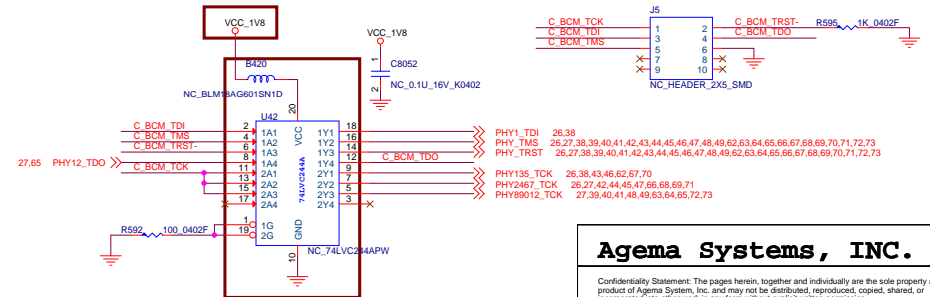
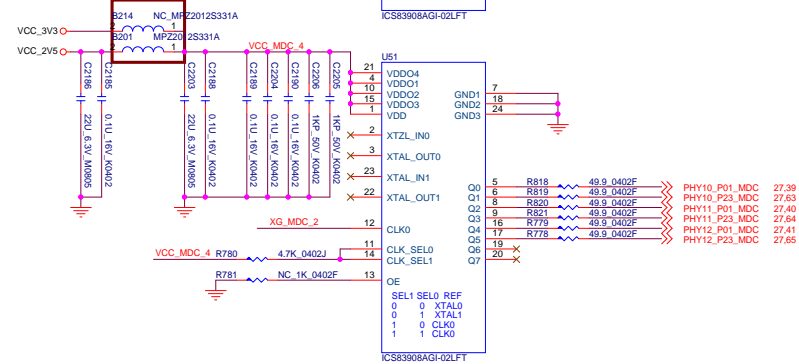
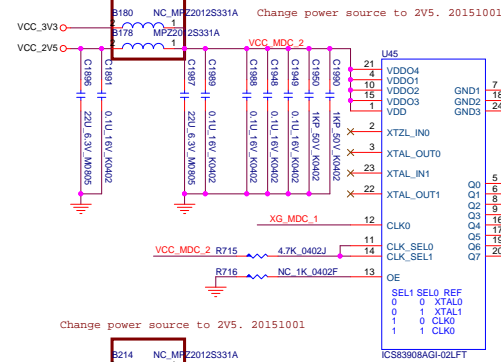
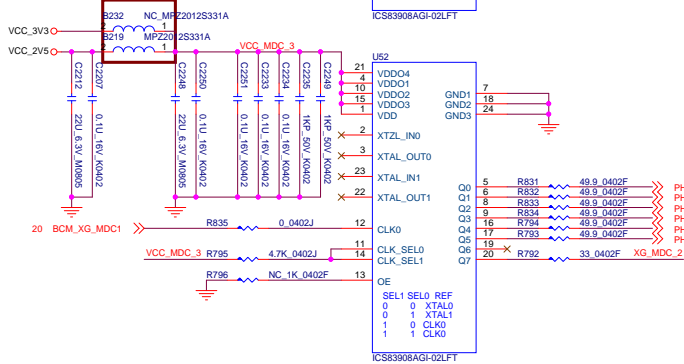
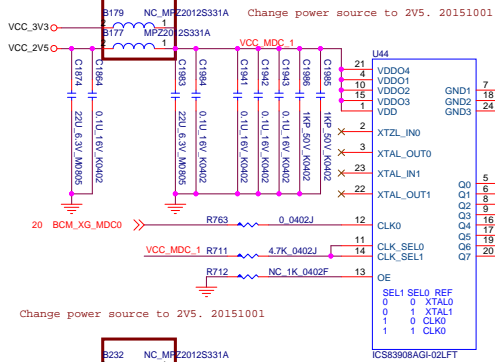


Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|----------------|---------|
| File | 01-24_BCM56854[PWR3] | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | | | |
| Date: | Tuesday, September 13, 2016 | Sheet 24 of 80 | |





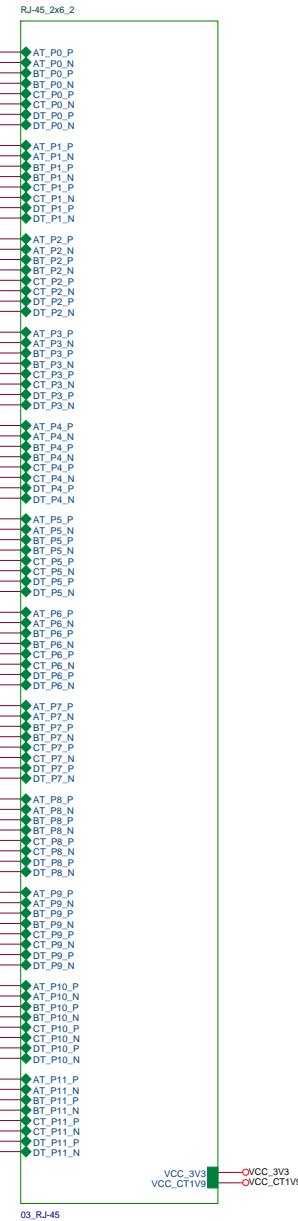
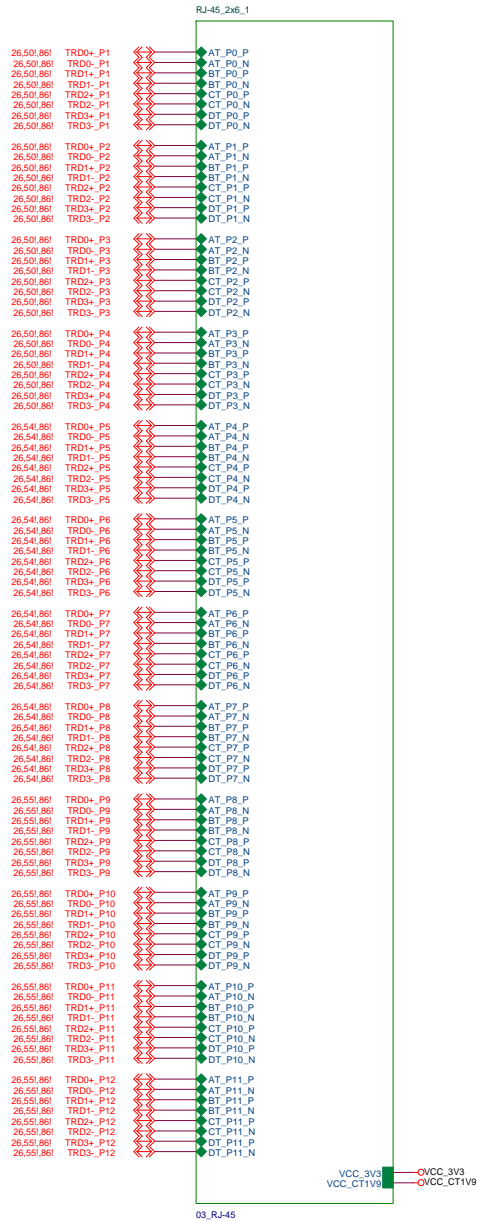
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 01-26_PHY MISC | Rev | 1.1 |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 28 of 80 |

P1~P12

P13~P24



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|--------------------------------|-------|----------|
| File | 01-29_Block_10G RJ-45 [P1-P24] | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 29 of 80 |

P25~P36

RJ-45, 2x6, 3

| | | | |
|------------|-------|-----|----------|
| 27.591.881 | TRD0+ | P25 | AT_P0_P |
| 27.591.881 | TRD0- | P25 | BT_P0_N |
| 27.591.881 | TRD1+ | P25 | BT_P0_P |
| 27.591.881 | TRD1- | P25 | BT_P0_N |
| 27.591.881 | TRD2+ | P25 | CT_P0_P |
| 27.591.881 | TRD2- | P25 | CT_P0_N |
| 27.591.881 | TRD3+ | P25 | DT_P0_P |
| 27.591.881 | TRD3- | P25 | DT_P0_N |
| 27.591.881 | TRD0+ | P26 | AT_P1_P |
| 27.591.881 | TRD0- | P26 | BT_P1_N |
| 27.591.881 | TRD1+ | P26 | BT_P1_P |
| 27.591.881 | TRD1- | P26 | BT_P1_N |
| 27.591.881 | TRD2+ | P26 | CT_P1_P |
| 27.591.881 | TRD2- | P26 | CT_P1_N |
| 27.591.881 | TRD3+ | P26 | DT_P1_P |
| 27.591.881 | TRD3- | P26 | DT_P1_N |
| 27.591.881 | TRD0+ | P27 | AT_P2_P |
| 27.591.881 | TRD0- | P27 | BT_P2_N |
| 27.591.881 | TRD1+ | P27 | BT_P2_P |
| 27.591.881 | TRD1- | P27 | BT_P2_N |
| 27.591.881 | TRD2+ | P27 | CT_P2_P |
| 27.591.881 | TRD2- | P27 | CT_P2_N |
| 27.591.881 | TRD3+ | P27 | DT_P2_P |
| 27.591.881 | TRD3- | P27 | DT_P2_N |
| 27.591.881 | TRD0+ | P28 | AT_P3_P |
| 27.591.881 | TRD0- | P28 | BT_P3_N |
| 27.591.881 | TRD1+ | P28 | BT_P3_P |
| 27.591.881 | TRD1- | P28 | BT_P3_N |
| 27.591.881 | TRD2+ | P28 | CT_P3_P |
| 27.591.881 | TRD2- | P28 | CT_P3_N |
| 27.591.881 | TRD3+ | P28 | DT_P3_P |
| 27.591.881 | TRD3- | P28 | DT_P3_N |
| 27.601.881 | TRD0+ | P29 | AT_P4_P |
| 27.601.881 | TRD0- | P29 | BT_P4_N |
| 27.601.881 | TRD1+ | P29 | BT_P4_P |
| 27.601.881 | TRD1- | P29 | BT_P4_N |
| 27.601.881 | TRD2+ | P29 | CT_P4_P |
| 27.601.881 | TRD2- | P29 | CT_P4_N |
| 27.601.881 | TRD3+ | P29 | DT_P4_P |
| 27.601.881 | TRD3- | P29 | DT_P4_N |
| 27.601.881 | TRD0+ | P30 | AT_P5_P |
| 27.601.881 | TRD0- | P30 | BT_P5_N |
| 27.601.881 | TRD1+ | P30 | BT_P5_P |
| 27.601.881 | TRD1- | P30 | BT_P5_N |
| 27.601.881 | TRD2+ | P30 | CT_P5_P |
| 27.601.881 | TRD2- | P30 | CT_P5_N |
| 27.601.881 | TRD3+ | P30 | DT_P5_P |
| 27.601.881 | TRD3- | P30 | DT_P5_N |
| 27.601.881 | TRD0+ | P31 | AT_P6_P |
| 27.601.881 | TRD0- | P31 | BT_P6_N |
| 27.601.881 | TRD1+ | P31 | BT_P6_P |
| 27.601.881 | TRD1- | P31 | BT_P6_N |
| 27.601.881 | TRD2+ | P31 | CT_P6_P |
| 27.601.881 | TRD2- | P31 | CT_P6_N |
| 27.601.881 | TRD3+ | P31 | DT_P6_P |
| 27.601.881 | TRD3- | P31 | DT_P6_N |
| 27.601.881 | TRD0+ | P32 | AT_P7_P |
| 27.601.881 | TRD0- | P32 | BT_P7_N |
| 27.601.881 | TRD1+ | P32 | BT_P7_P |
| 27.601.881 | TRD1- | P32 | BT_P7_N |
| 27.601.881 | TRD2+ | P32 | CT_P7_P |
| 27.601.881 | TRD2- | P32 | CT_P7_N |
| 27.601.881 | TRD3+ | P32 | DT_P7_P |
| 27.601.881 | TRD3- | P32 | DT_P7_N |
| 27.611.881 | TRD0+ | P33 | AT_P8_P |
| 27.611.881 | TRD0- | P33 | BT_P8_N |
| 27.611.881 | TRD1+ | P33 | BT_P8_P |
| 27.611.881 | TRD1- | P33 | BT_P8_N |
| 27.611.881 | TRD2+ | P33 | CT_P8_P |
| 27.611.881 | TRD2- | P33 | CT_P8_N |
| 27.611.881 | TRD3+ | P33 | DT_P8_P |
| 27.611.881 | TRD3- | P33 | DT_P8_N |
| 27.611.881 | TRD0+ | P34 | AT_P9_P |
| 27.611.881 | TRD0- | P34 | BT_P9_N |
| 27.611.881 | TRD1+ | P34 | BT_P9_P |
| 27.611.881 | TRD1- | P34 | BT_P9_N |
| 27.611.881 | TRD2+ | P34 | CT_P9_P |
| 27.611.881 | TRD2- | P34 | CT_P9_N |
| 27.611.881 | TRD3+ | P34 | DT_P9_P |
| 27.611.881 | TRD3- | P34 | DT_P9_N |
| 27.611.881 | TRD0+ | P35 | AT_P10_P |
| 27.611.881 | TRD0- | P35 | BT_P10_N |
| 27.611.881 | TRD1+ | P35 | BT_P10_P |
| 27.611.881 | TRD1- | P35 | BT_P10_N |
| 27.611.881 | TRD2+ | P35 | CT_P10_P |
| 27.611.881 | TRD2- | P35 | CT_P10_N |
| 27.611.881 | TRD3+ | P35 | DT_P10_P |
| 27.611.881 | TRD3- | P35 | DT_P10_N |
| 27.611.881 | TRD0+ | P36 | AT_P11_P |
| 27.611.881 | TRD0- | P36 | BT_P11_N |
| 27.611.881 | TRD1+ | P36 | BT_P11_P |
| 27.611.881 | TRD1- | P36 | BT_P11_N |
| 27.611.881 | TRD2+ | P36 | CT_P11_P |
| 27.611.881 | TRD2- | P36 | CT_P11_N |
| 27.611.881 | TRD3+ | P36 | DT_P11_P |
| 27.611.881 | TRD3- | P36 | DT_P11_N |

VCC_3V3
VCC_CT1V9

03_RJ-45

P37~P48

RJ-45, 2x6, 4

| | | | |
|------------|-------|-----|----------|
| 27.511.891 | TRD0+ | P37 | AT_P0_P |
| 27.511.891 | TRD0- | P37 | BT_P0_N |
| 27.511.891 | TRD1+ | P37 | BT_P0_P |
| 27.511.891 | TRD1- | P37 | BT_P0_N |
| 27.511.891 | TRD2+ | P37 | CT_P0_P |
| 27.511.891 | TRD2- | P37 | CT_P0_N |
| 27.511.891 | TRD3+ | P37 | DT_P0_P |
| 27.511.891 | TRD3- | P37 | DT_P0_N |
| 27.511.891 | TRD0+ | P38 | AT_P1_P |
| 27.511.891 | TRD0- | P38 | BT_P1_N |
| 27.511.891 | TRD1+ | P38 | BT_P1_P |
| 27.511.891 | TRD1- | P38 | BT_P1_N |
| 27.511.891 | TRD2+ | P38 | CT_P1_P |
| 27.511.891 | TRD2- | P38 | CT_P1_N |
| 27.511.891 | TRD3+ | P38 | DT_P1_P |
| 27.511.891 | TRD3- | P38 | DT_P1_N |
| 27.511.891 | TRD0+ | P39 | AT_P2_P |
| 27.511.891 | TRD0- | P39 | BT_P2_N |
| 27.511.891 | TRD1+ | P39 | BT_P2_P |
| 27.511.891 | TRD1- | P39 | BT_P2_N |
| 27.511.891 | TRD2+ | P39 | CT_P2_P |
| 27.511.891 | TRD2- | P39 | CT_P2_N |
| 27.511.891 | TRD3+ | P39 | DT_P2_P |
| 27.511.891 | TRD3- | P39 | DT_P2_N |
| 27.511.891 | TRD0+ | P40 | AT_P3_P |
| 27.511.891 | TRD0- | P40 | BT_P3_N |
| 27.511.891 | TRD1+ | P40 | BT_P3_P |
| 27.511.891 | TRD1- | P40 | BT_P3_N |
| 27.511.891 | TRD2+ | P40 | CT_P3_P |
| 27.511.891 | TRD2- | P40 | CT_P3_N |
| 27.511.891 | TRD3+ | P40 | DT_P3_P |
| 27.511.891 | TRD3- | P40 | DT_P3_N |
| 27.521.891 | TRD0+ | P41 | AT_P4_P |
| 27.521.891 | TRD0- | P41 | BT_P4_N |
| 27.521.891 | TRD1+ | P41 | BT_P4_P |
| 27.521.891 | TRD1- | P41 | BT_P4_N |
| 27.521.891 | TRD2+ | P41 | CT_P4_P |
| 27.521.891 | TRD2- | P41 | CT_P4_N |
| 27.521.891 | TRD3+ | P41 | DT_P4_P |
| 27.521.891 | TRD3- | P41 | DT_P4_N |
| 27.521.891 | TRD0+ | P42 | AT_P5_P |
| 27.521.891 | TRD0- | P42 | BT_P5_N |
| 27.521.891 | TRD1+ | P42 | BT_P5_P |
| 27.521.891 | TRD1- | P42 | BT_P5_N |
| 27.521.891 | TRD2+ | P42 | CT_P5_P |
| 27.521.891 | TRD2- | P42 | CT_P5_N |
| 27.521.891 | TRD3+ | P42 | DT_P5_P |
| 27.521.891 | TRD3- | P42 | DT_P5_N |
| 27.521.891 | TRD0+ | P43 | AT_P6_P |
| 27.521.891 | TRD0- | P43 | BT_P6_N |
| 27.521.891 | TRD1+ | P43 | BT_P6_P |
| 27.521.891 | TRD1- | P43 | BT_P6_N |
| 27.521.891 | TRD2+ | P43 | CT_P6_P |
| 27.521.891 | TRD2- | P43 | CT_P6_N |
| 27.521.891 | TRD3+ | P43 | DT_P6_P |
| 27.521.891 | TRD3- | P43 | DT_P6_N |
| 27.521.891 | TRD0+ | P44 | AT_P7_P |
| 27.521.891 | TRD0- | P44 | BT_P7_N |
| 27.521.891 | TRD1+ | P44 | BT_P7_P |
| 27.521.891 | TRD1- | P44 | BT_P7_N |
| 27.521.891 | TRD2+ | P44 | CT_P7_P |
| 27.521.891 | TRD2- | P44 | CT_P7_N |
| 27.521.891 | TRD3+ | P44 | DT_P7_P |
| 27.521.891 | TRD3- | P44 | DT_P7_N |
| 27.531.891 | TRD0+ | P45 | AT_P8_P |
| 27.531.891 | TRD0- | P45 | BT_P8_N |
| 27.531.891 | TRD1+ | P45 | BT_P8_P |
| 27.531.891 | TRD1- | P45 | BT_P8_N |
| 27.531.891 | TRD2+ | P45 | CT_P8_P |
| 27.531.891 | TRD2- | P45 | CT_P8_N |
| 27.531.891 | TRD3+ | P45 | DT_P8_P |
| 27.531.891 | TRD3- | P45 | DT_P8_N |
| 27.531.891 | TRD0+ | P46 | AT_P9_P |
| 27.531.891 | TRD0- | P46 | BT_P9_N |
| 27.531.891 | TRD1+ | P46 | BT_P9_P |
| 27.531.891 | TRD1- | P46 | BT_P9_N |
| 27.531.891 | TRD2+ | P46 | CT_P9_P |
| 27.531.891 | TRD2- | P46 | CT_P9_N |
| 27.531.891 | TRD3+ | P46 | DT_P9_P |
| 27.531.891 | TRD3- | P46 | DT_P9_N |
| 27.531.891 | TRD0+ | P47 | AT_P10_P |
| 27.531.891 | TRD0- | P47 | BT_P10_N |
| 27.531.891 | TRD1+ | P47 | BT_P10_P |
| 27.531.891 | TRD1- | P47 | BT_P10_N |
| 27.531.891 | TRD2+ | P47 | CT_P10_P |
| 27.531.891 | TRD2- | P47 | CT_P10_N |
| 27.531.891 | TRD3+ | P47 | DT_P10_P |
| 27.531.891 | TRD3- | P47 | DT_P10_N |
| 27.531.891 | TRD0+ | P48 | AT_P11_P |
| 27.531.891 | TRD0- | P48 | BT_P11_N |
| 27.531.891 | TRD1+ | P48 | BT_P11_P |
| 27.531.891 | TRD1- | P48 | BT_P11_N |
| 27.531.891 | TRD2+ | P48 | CT_P11_P |
| 27.531.891 | TRD2- | P48 | CT_P11_N |
| 27.531.891 | TRD3+ | P48 | DT_P11_P |
| 27.531.891 | TRD3- | P48 | DT_P11_N |

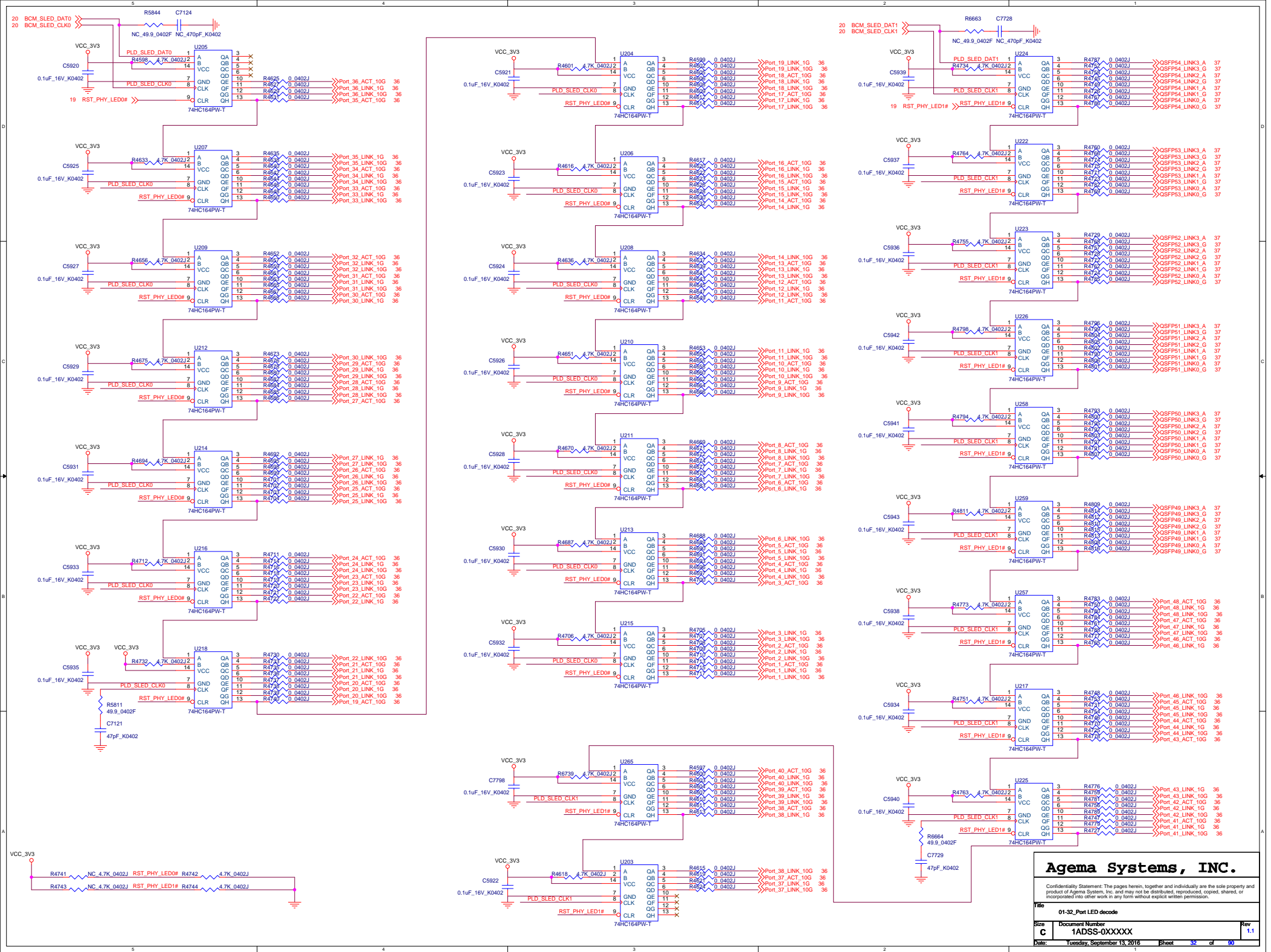
VCC_3V3
VCC_CT1V9

03_RJ-45

Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|---------------------------------|-------|----------|
| File | 01-30_Block_10G RJ-45 [P25-P48] | | |
| Size | Document Number | Rev | 1.1 |
| C | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 30 of 80 |

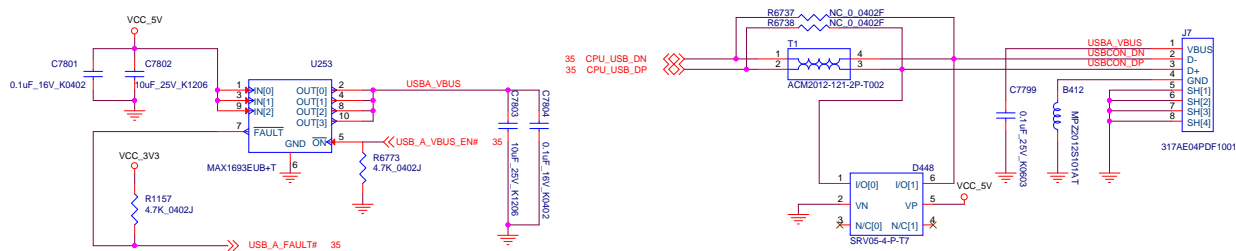


Agema Systems, INC.

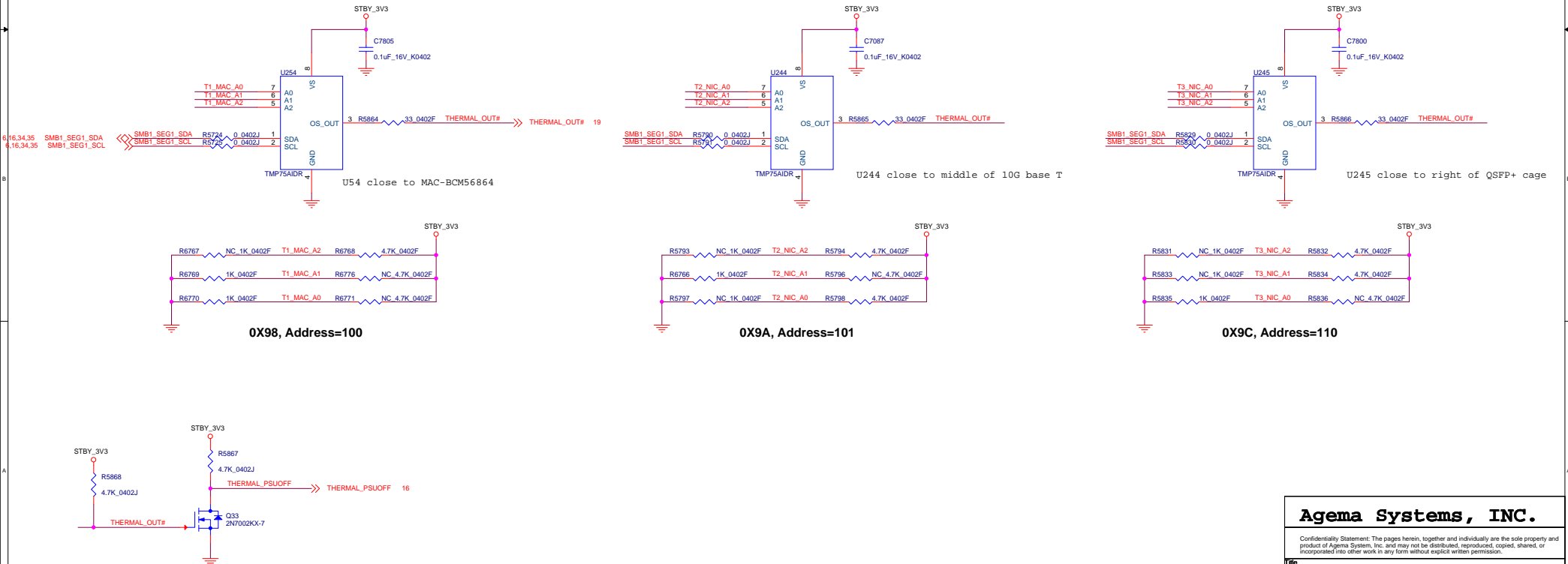
Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|---------|----------|
| File | 01-32_Port LED decode | | |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | Rev 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 32 of 80 |

USB_A Device



Thermal Sensor

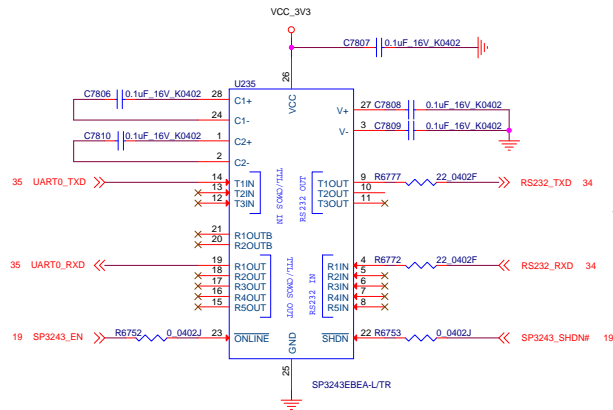


Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

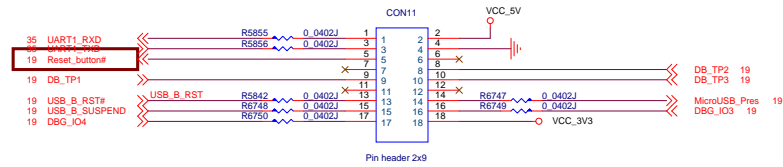
| | | | |
|--------------------|-----------------------------|-------|----------|
| Title | | | |
| 01-33_USB& Thermal | | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 33 of 90 |

UART Interface

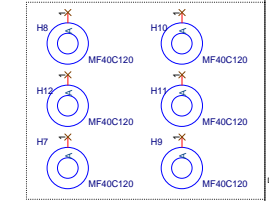


Add reset button signal. 20150915

7-Segment digit LED Connector

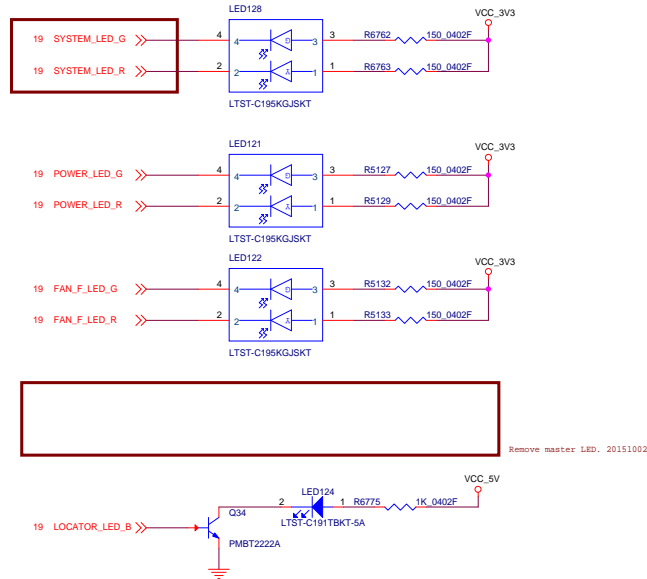


FOR SMT

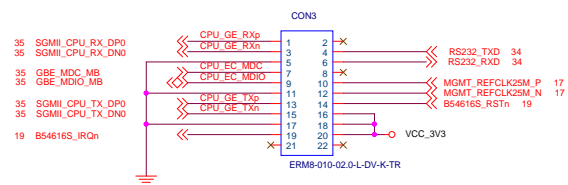


LED Indicator

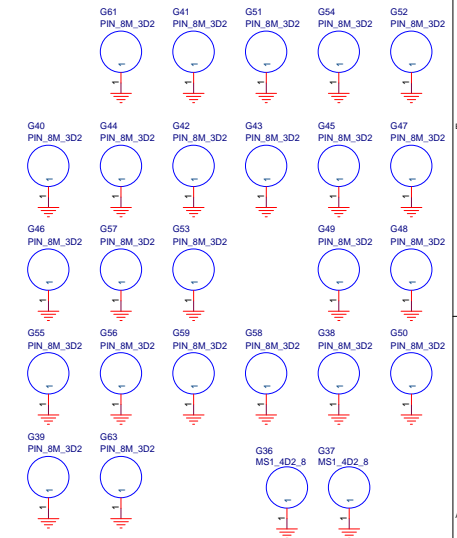
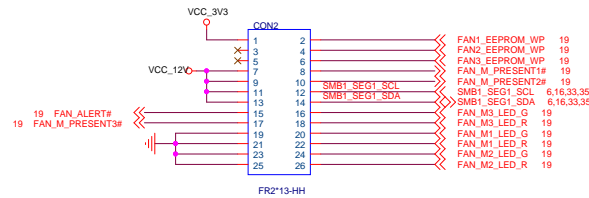
Change pin name from health to system. 20151002



MGMT Board Connector



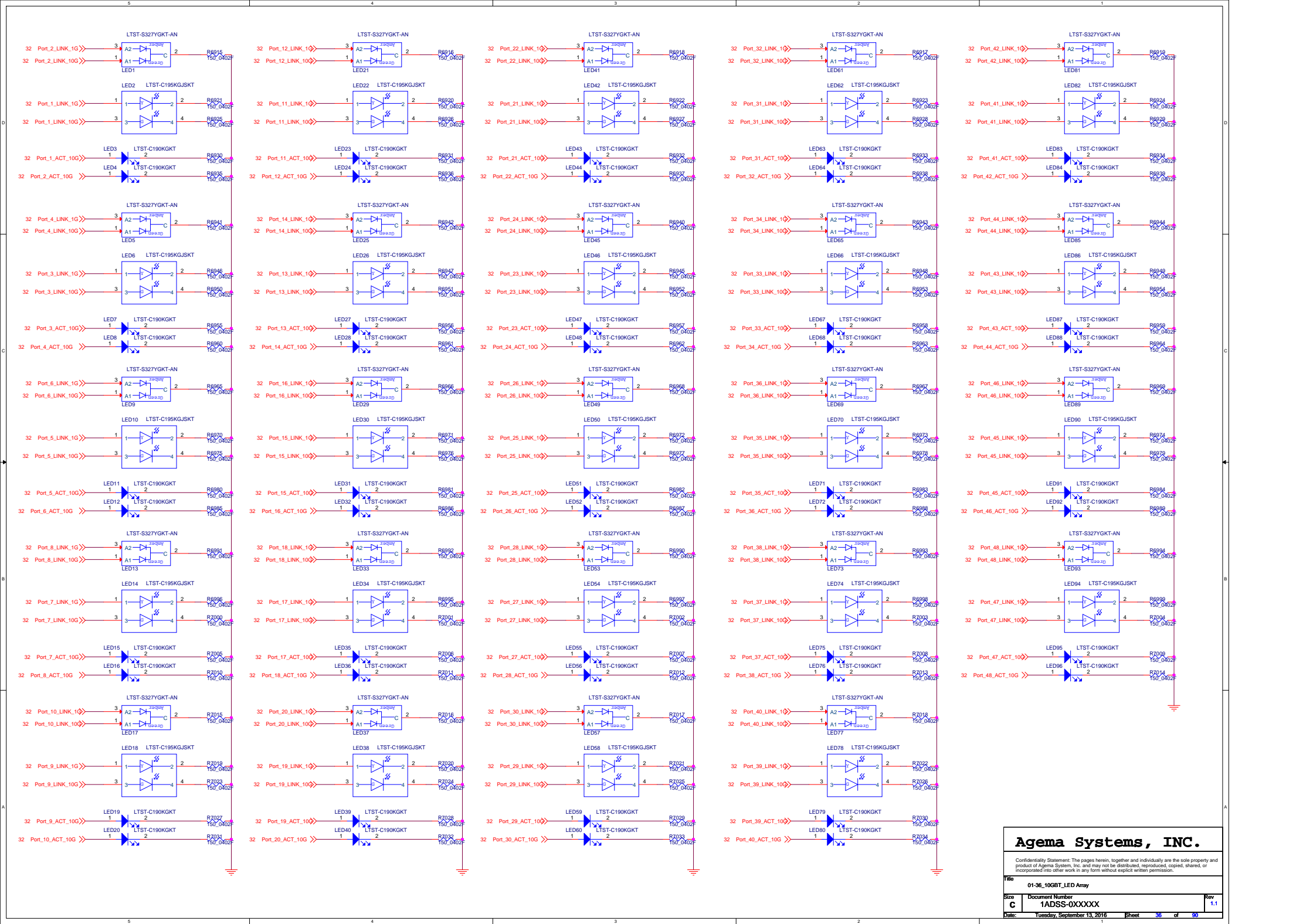
FAN Board Connector



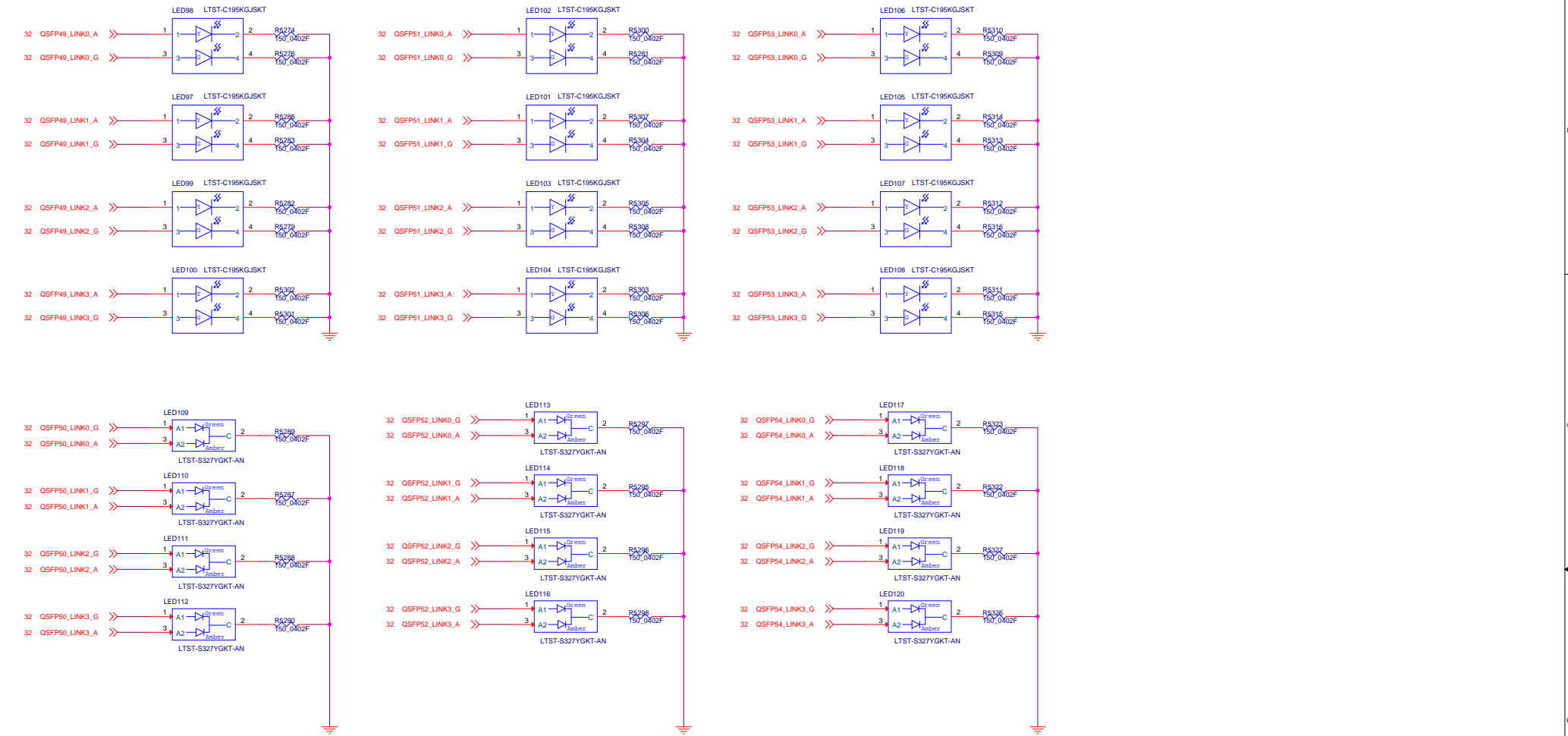
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|--------------|----------|
| File | 01-34_FAN CONN/MGMT7-LED | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev |
| C | | | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet | 34 of 80 |



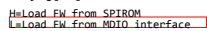
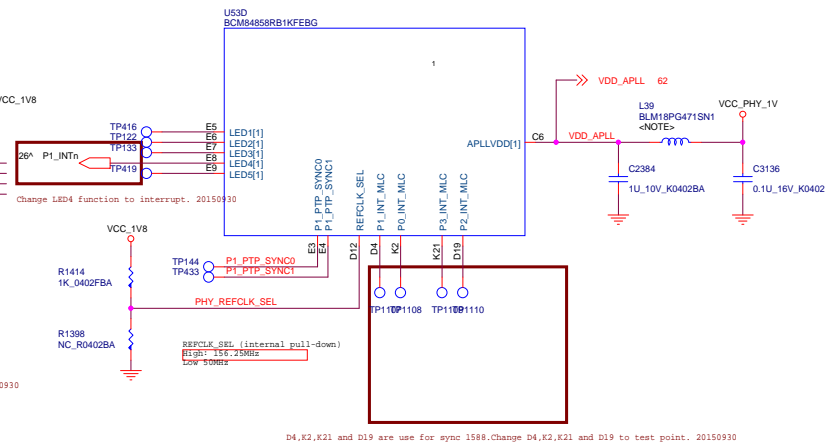
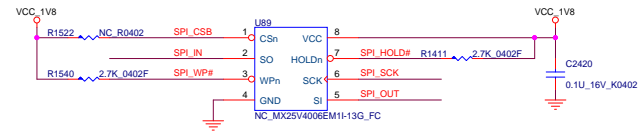
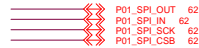
Change QSPF+ to dual color (R/G/B /low speed, G/R) in R02.
2014-0423

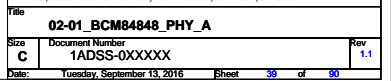
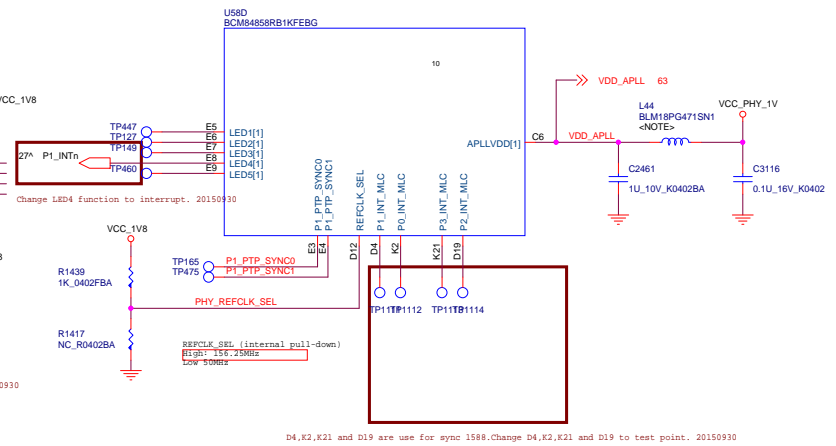
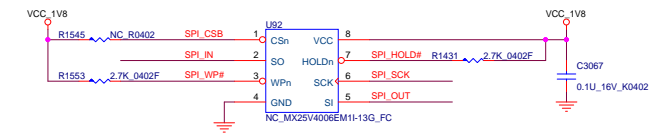
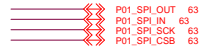


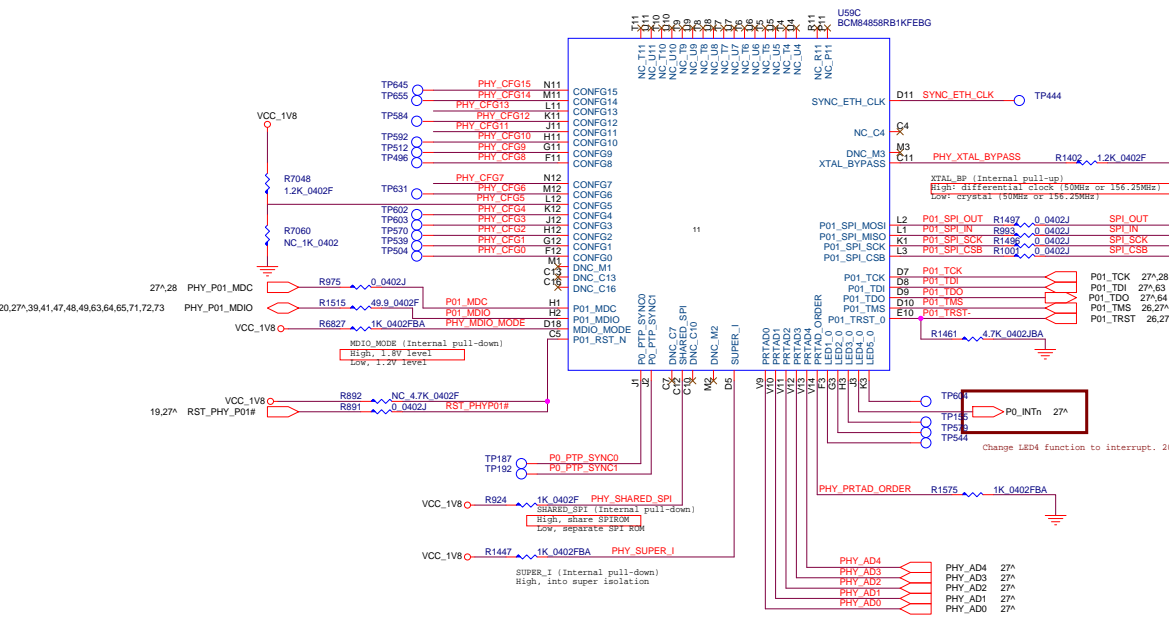
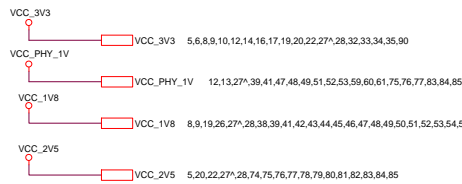
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

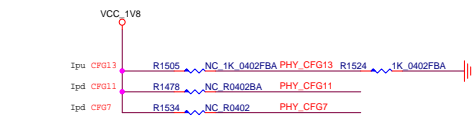
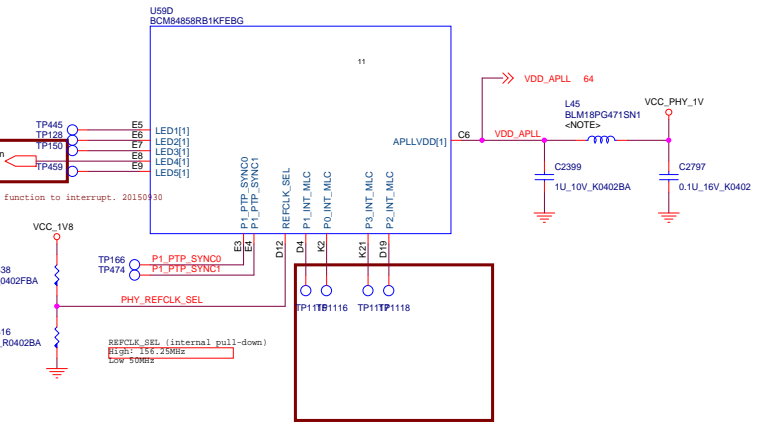
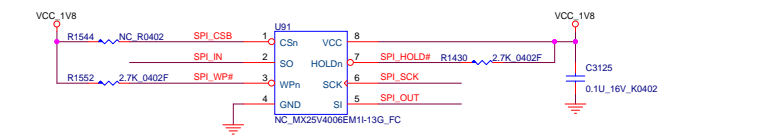
| | | | |
|-------|-----------------------------|-------|----------|
| File | 01-37_QSPF+_LED Array | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 37 of 80 |







SPI EEPROM



Config[7]: 10GBT core power down
High: Power down 10GBT core
Low: Power up 10GBT core

Config[11]: LED control
High: Under user control
Low: LED 1, 2, 3, 5 are predefined as configured. LED 4 under user control.

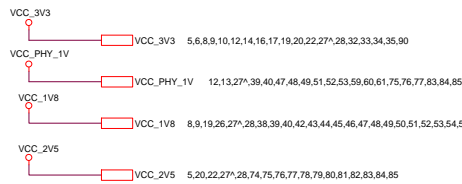
Config[12]:
High: Firmware forces 1G fiber
Low: Firmware forces sets speed of device interfaces to 10G

Config[13]: SPIROM
HLoad_EW from SPIROM
LLoad_EW from MDIO interface

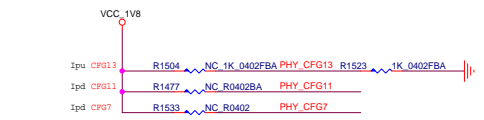
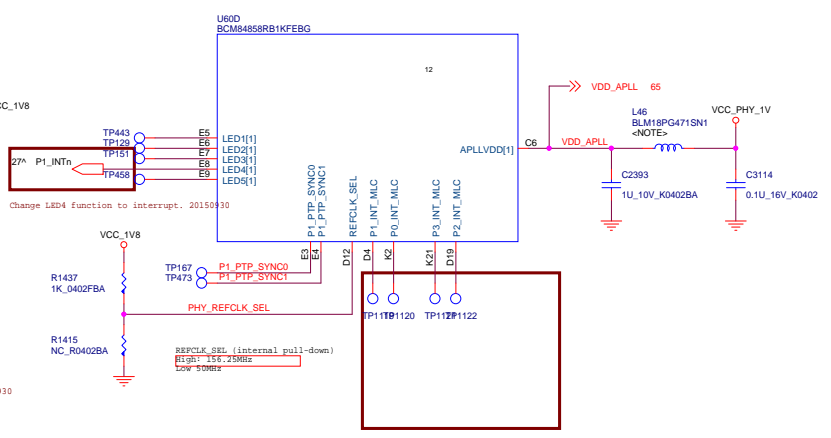
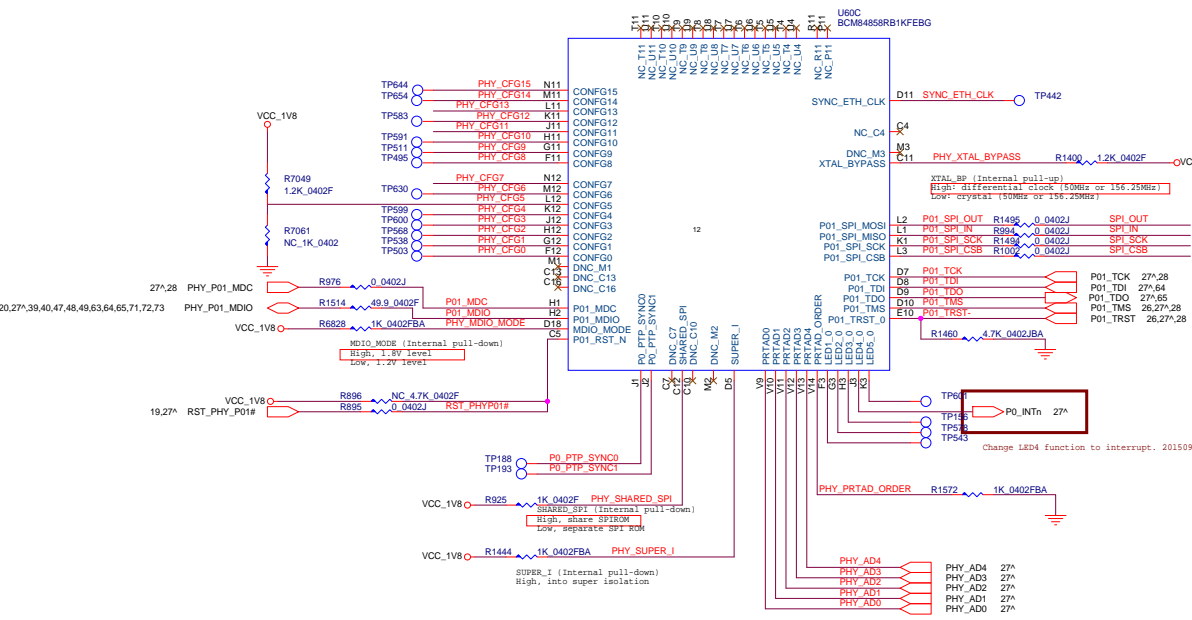
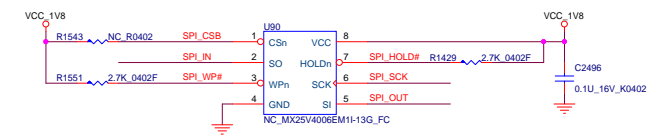
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | |
|-------|-----------------------------|----------------------|
| File | | 02-01_BCM84848_PHY_A |
| Size | Document Number | 1ADSS-0XXXXX |
| C | | Rev 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 40 of 80 |



SPI EEPROM



Config[7]: 10GBT core power down
High: Power down 10GBT core
Low: Power up 10GBT core

Config[11]: LED control
High: Under user control
Low: LED 1, 2, 3, 5 are predefined as configured. LED 4 under user control.

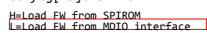
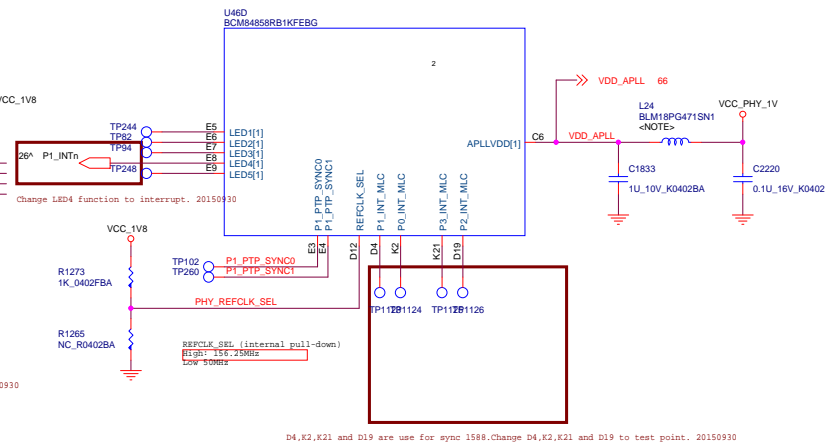
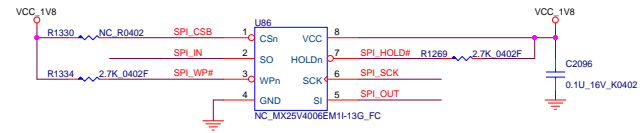
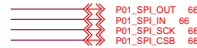
Config[12]:
High: Firmware forces 1G fiber
Low: Firmware forces sets speed of device interfaces to 10G

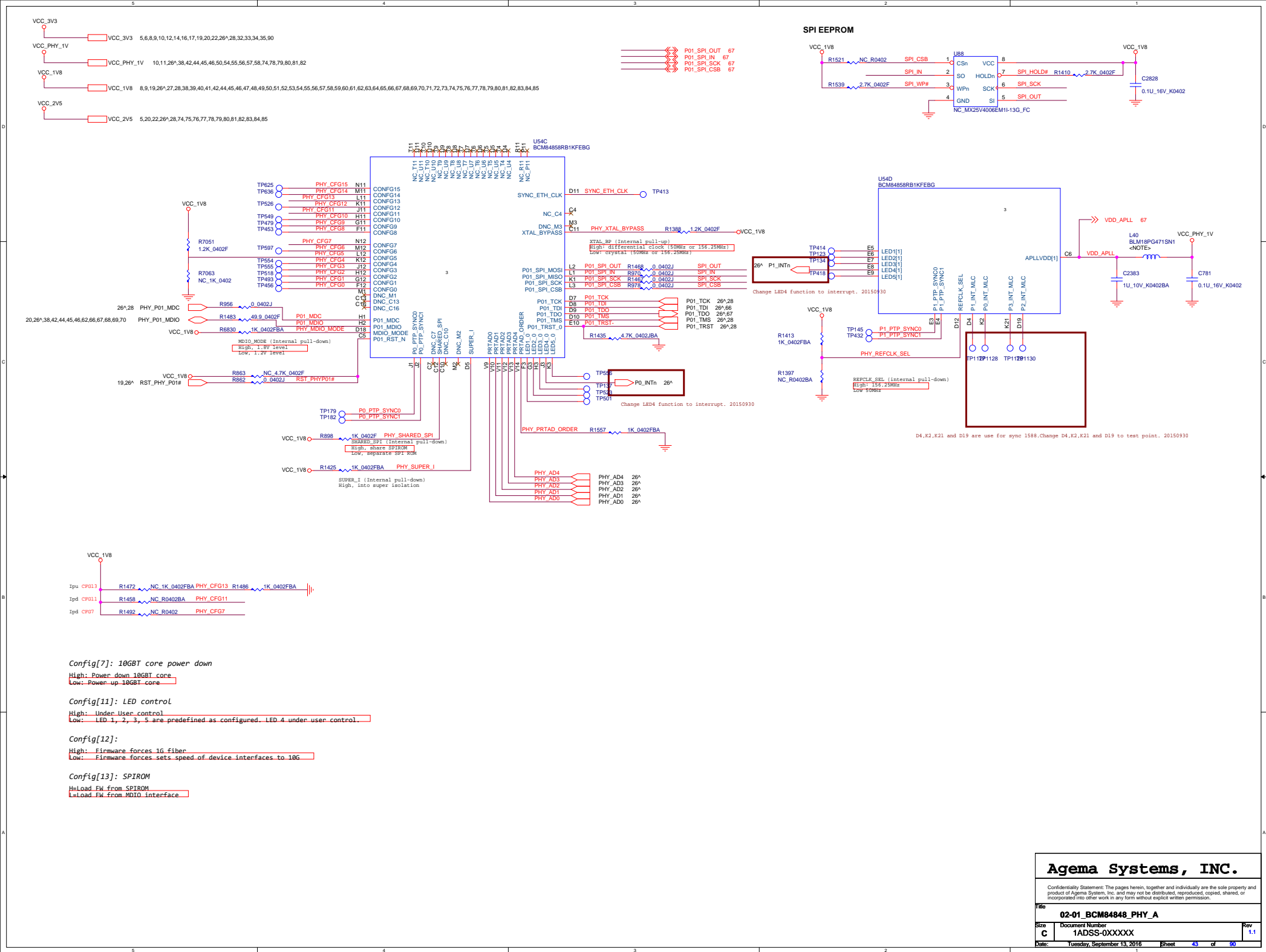
Config[13]: SPIROM
HLoad_EW from SPIROM
LLoad_EW from MDIO interface

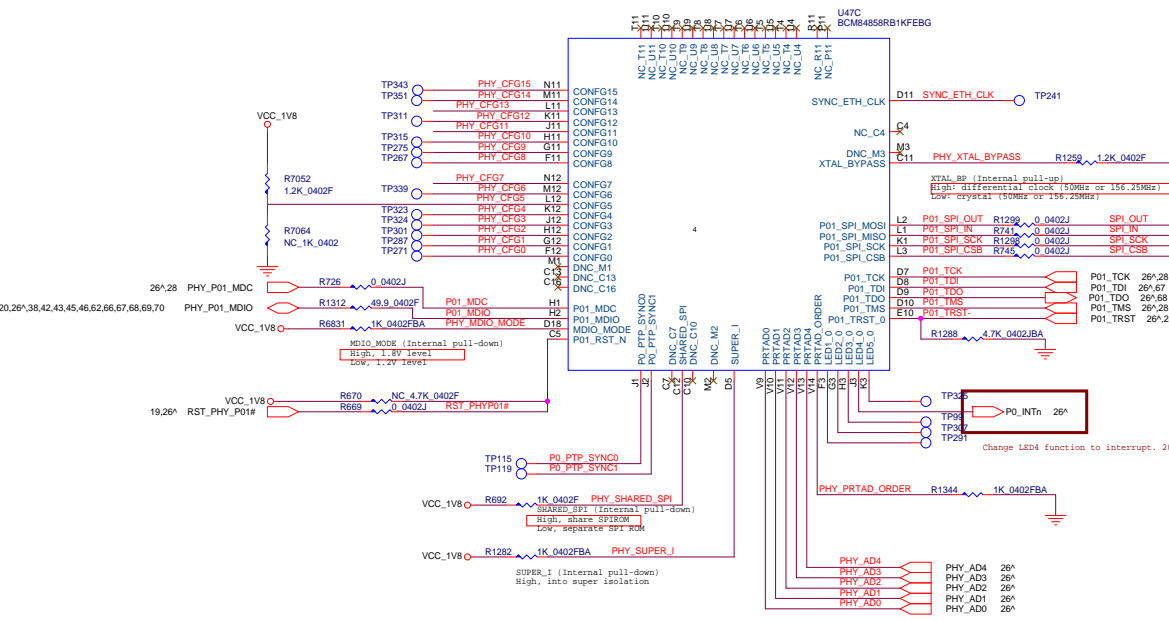
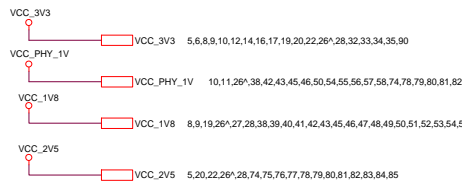
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

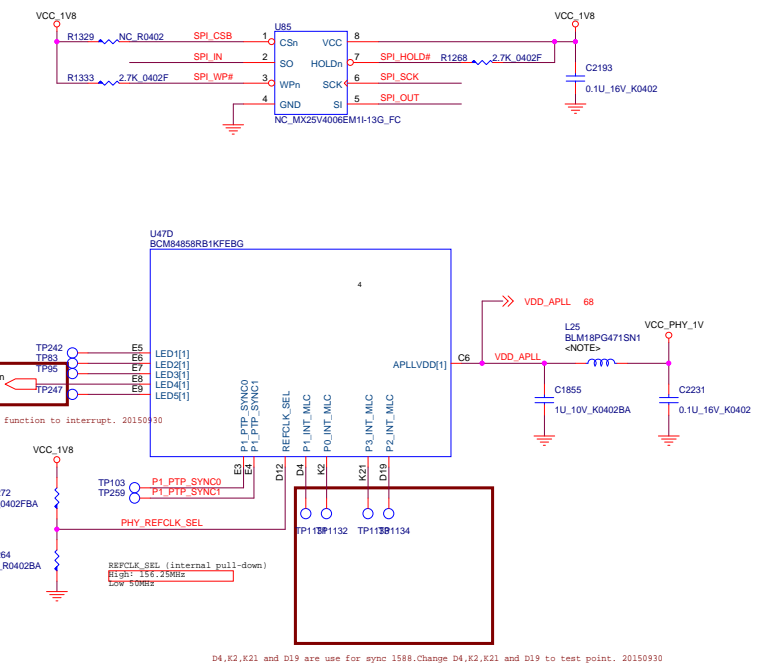
| | | | |
|-------|-----------------------------|--------------|----------|
| File | 02-01_BCM84848_PHY_A | | |
| Size | Document Number | 1ADSS-0XXXXX | |
| C | Sheet | 41 | of 80 |
| Date: | Tuesday, September 13, 2016 | Sheet | 41 of 80 |







SPI EEPROM



Config[7]: 10GBT core power down
High: Power down 10GBT core
Low: Power-up 10GBT core

Config[11]: LED control
High: Under user control
Low: LED 1, 2, 3, 5 are predefined as configured. LED 4 under user control.

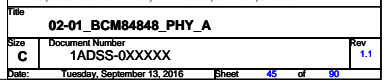
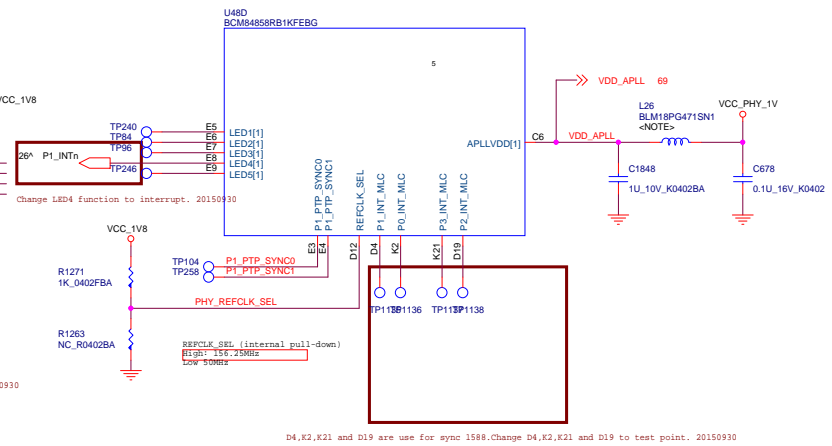
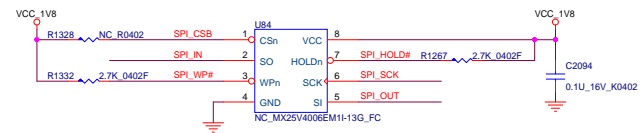
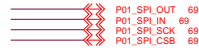
Config[12]:
High: Firmware forces 1G fiber
Low: Firmware forces sets speed of device interfaces to 10G

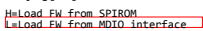
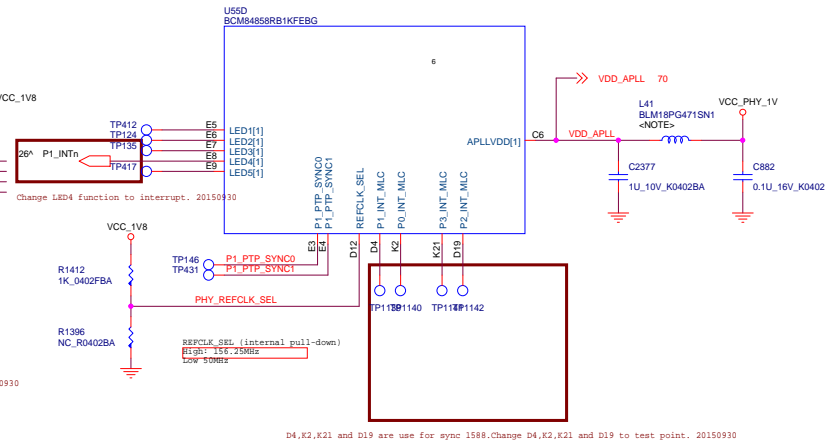
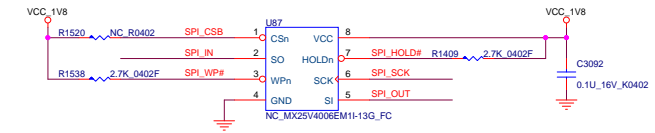
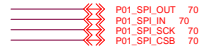
Config[13]: SPIROM
HLoad_EW from SPIROM
LLoad_EW from MDIO interface

Agema Systems, INC.

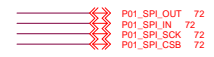
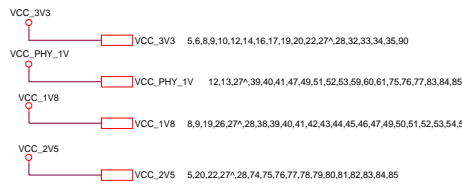
Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|--------------|----------|
| File | 02-01_BCM84848_PHY_A | | |
| Size | Document Number | 1ADSS-0XXXXX | |
| C | Sheet | 44 | of 80 |
| Date: | Tuesday, September 13, 2016 | Sheet | 44 of 80 |

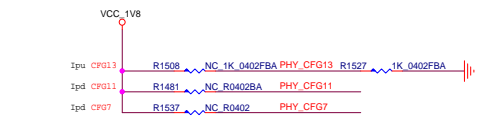
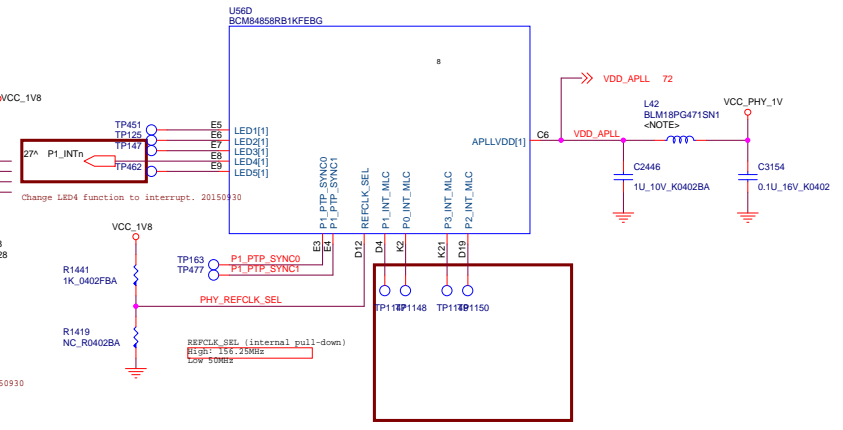
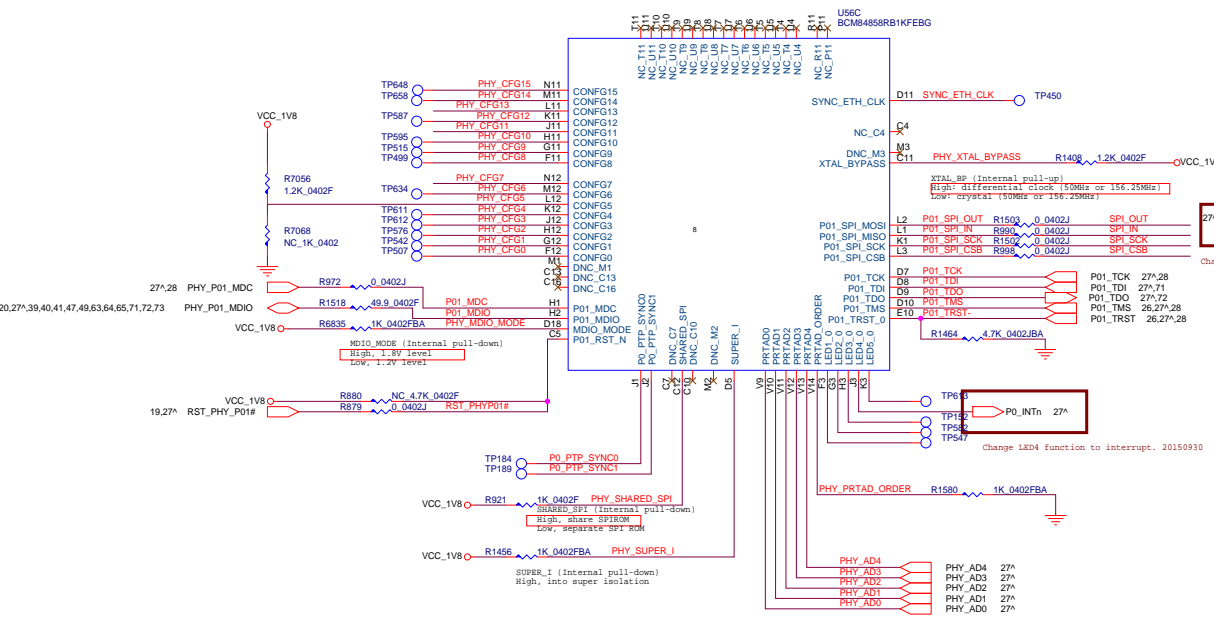
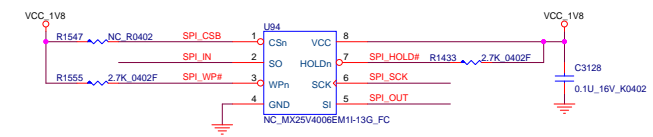




Date: Tuesday, September 13, 2016 Sheet 47 of 90



SPI EEPROM



Config[7]: 10GBT core power down
High: Power down 10GBT core
Low: Power-up 10GBT core

Config[11]: LED control
High: Under user control
Low: LED 1, 2, 3, 5 are predefined as configured. LED 4 under user control

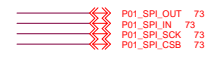
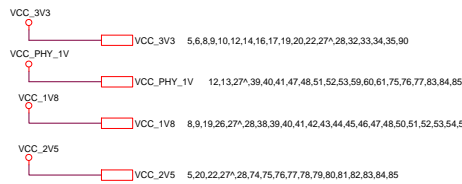
Config[12]:
High: Firmware forces 1G fiber
Low: Firmware forces sets speed of device interfaces to 10G

Config[13]: SPIROM
HLoad_EW from SPIROM
LLoad_EW from MDIO interface

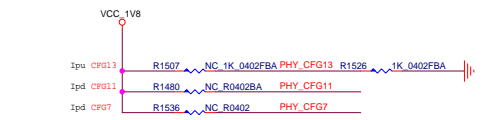
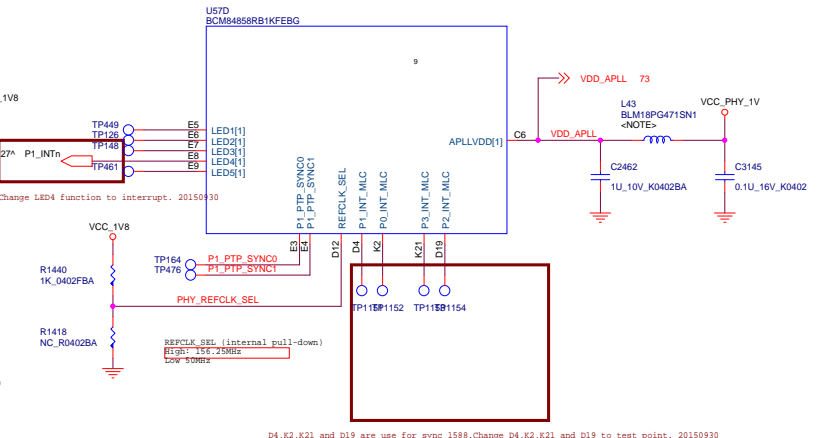
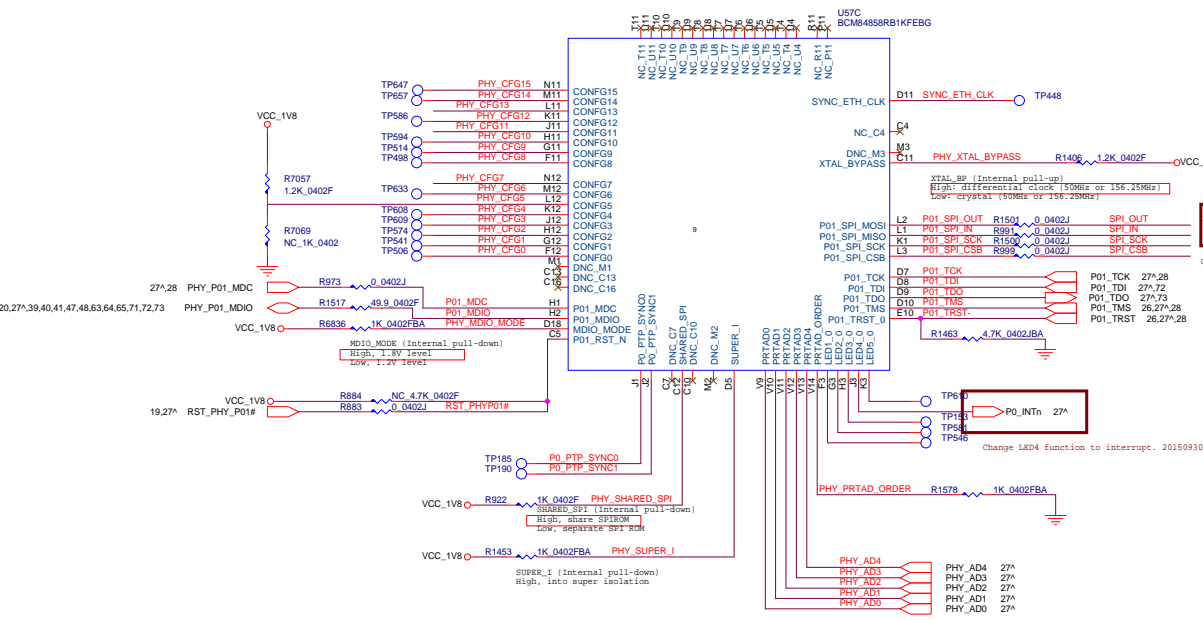
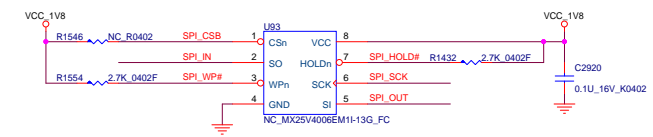
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|--------------|-------|
| File | 02-01_BCM84848_PHY_A | | |
| Size | Document Number | 1ADSS-0XXXXX | |
| C | Sheet | 48 | of 80 |
| Date: | Tuesday, September 13, 2016 | Rev | 1.1 |



SPI EEPROM



Config[7]: 10GBT core power down
High: Power down 10GBT core
Low: Power-up 10GBT core

Config[11]: LED control
High: Under user control
Low: LED 1, 2, 3, 5 are predefined as configured. LED 4 under user control.

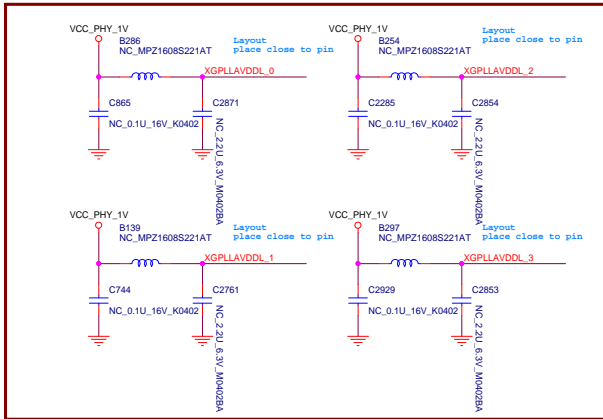
Config[12]:
High: Firmware forces 1G fiber
Low: Firmware forces sets speed of device interfaces to 10G

Config[13]: SPIROM
HLoad_EW from SPIROM
LLoad_EW from MDIO interface

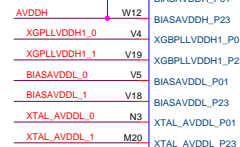
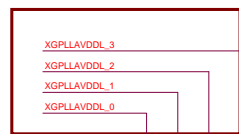
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

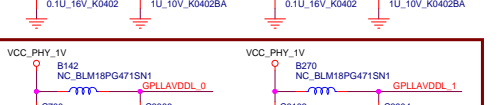
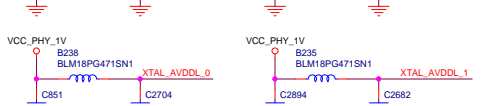
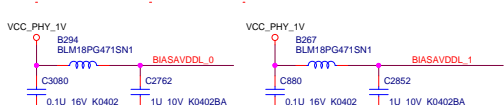
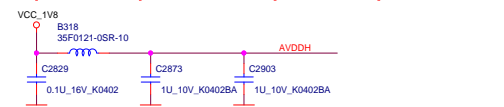
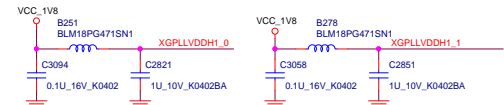
| | | | | | | | |
|-------|--|-----------------------------|--|----------------------|--|----------|--|
| File | | | | 02-01_BCM84848_PHY_A | | | |
| Size | | Document Number | | | | Rev | |
| C | | 1ADSS-0XXXXX | | | | 1.1 | |
| Date: | | Tuesday, September 13, 2016 | | Sheet | | 49 of 80 | |



NC V6, V7, V16 and V17, 20150930

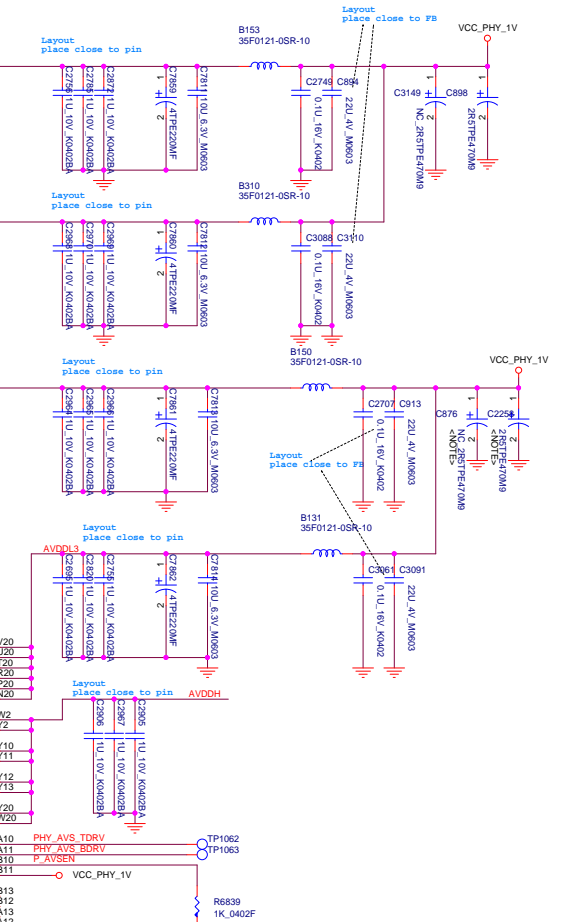
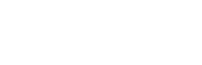


NC W7, W16, 20150930



NC GPLLAVDDL, 20150930

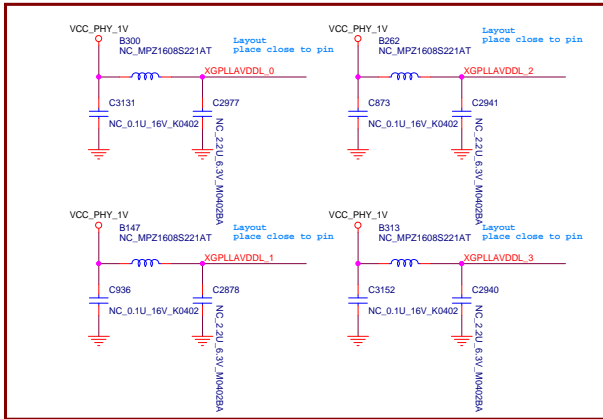
BCM84858B1KFEGB



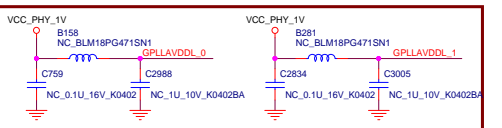
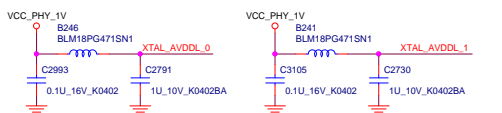
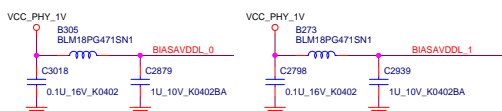
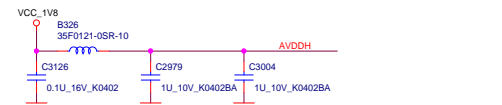
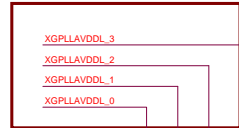
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

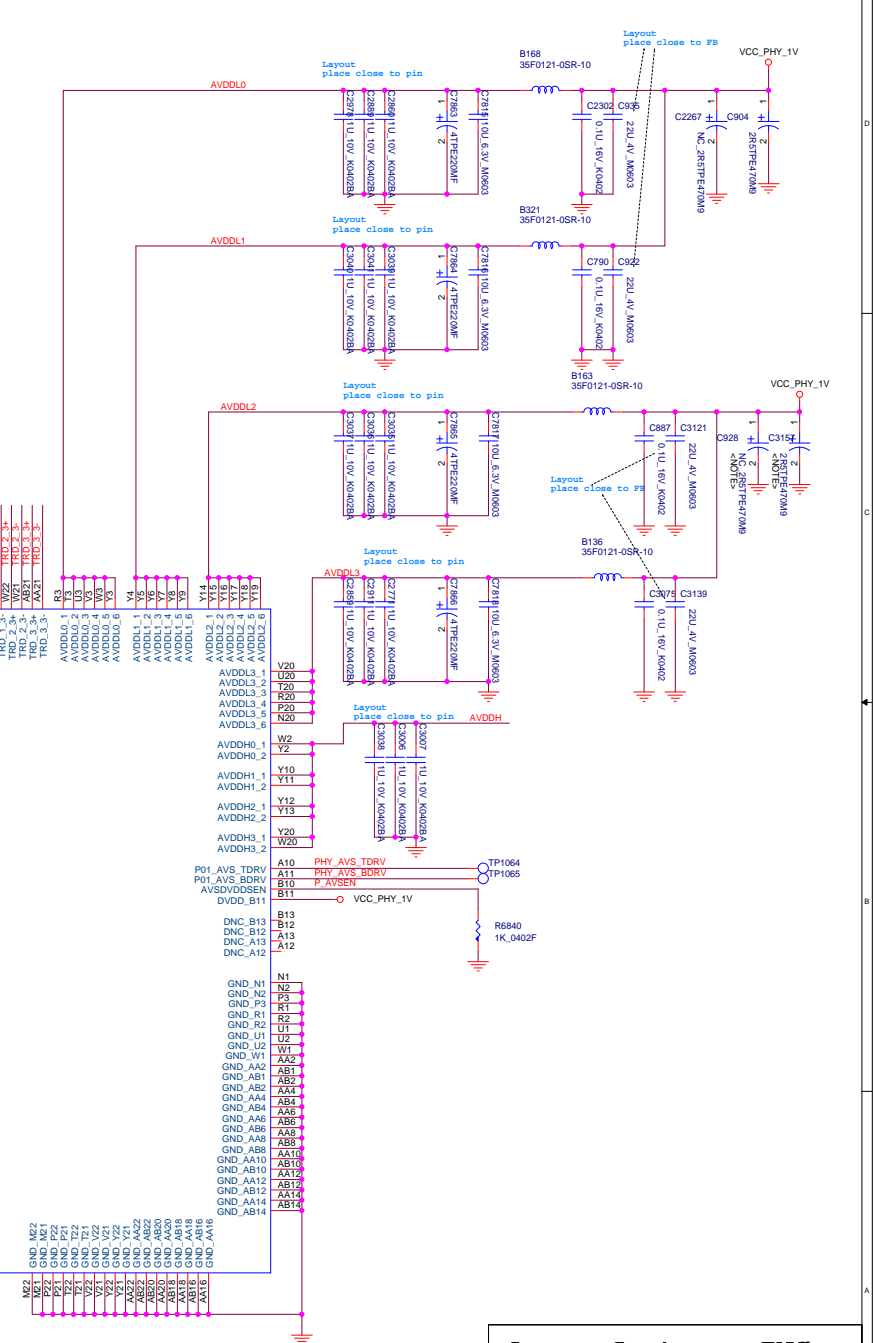
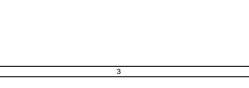
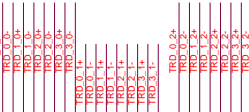
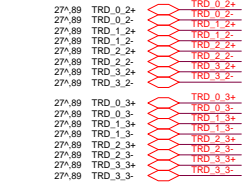
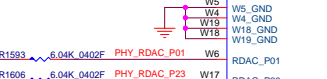
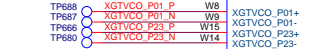
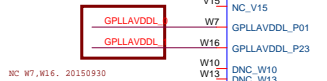
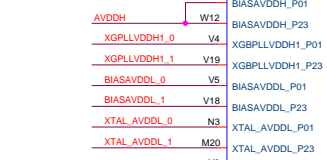
| | | | |
|------|----------------------|-----------------------------|----------------|
| File | 02-02 BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Date: | Tuesday, September 13, 2016 | Sheet 50 of 80 |



NC V6, V7, V16 and V17, 20150930



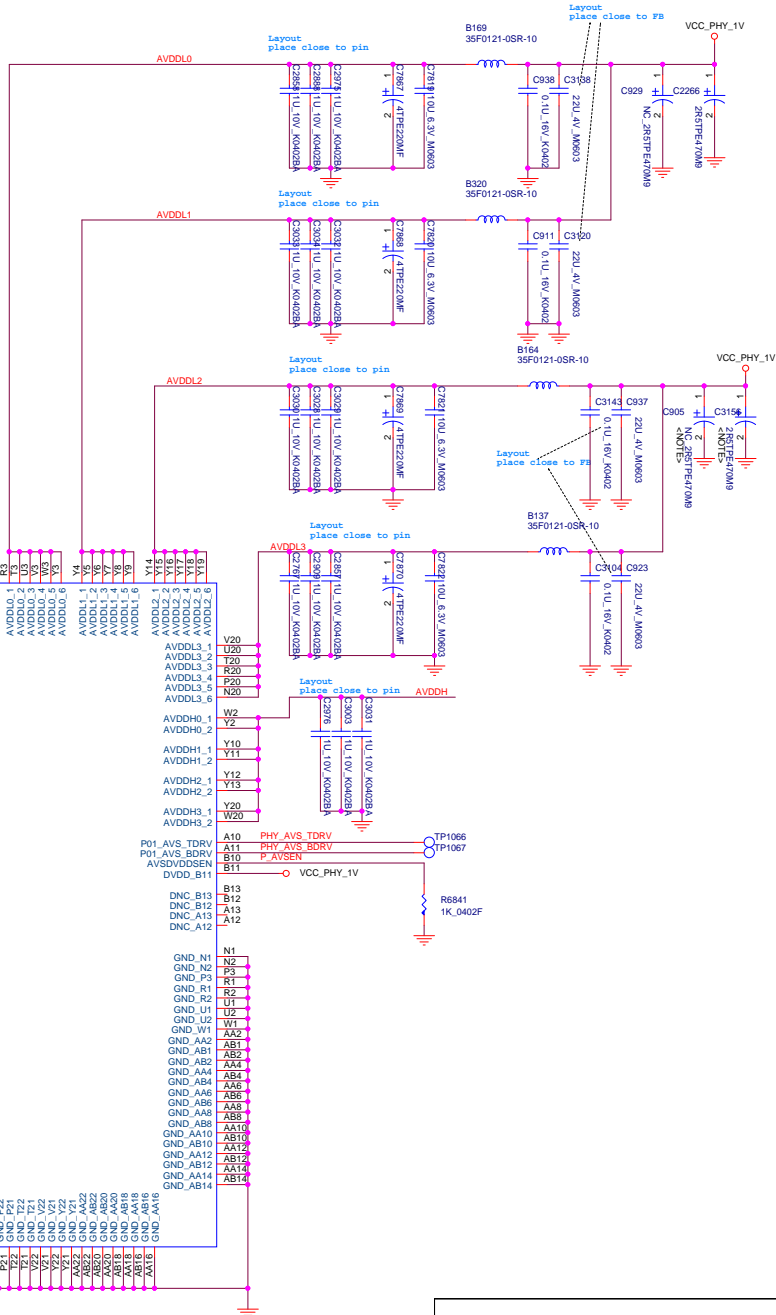
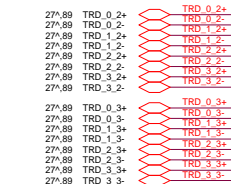
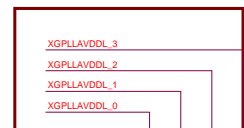
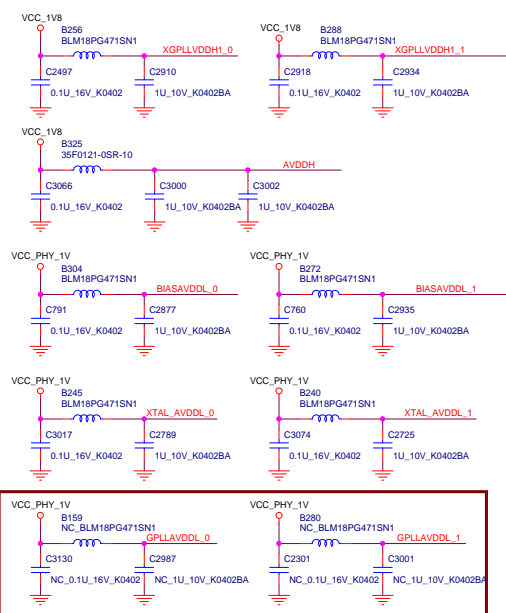
NC GPLLAVDDL, 20150930

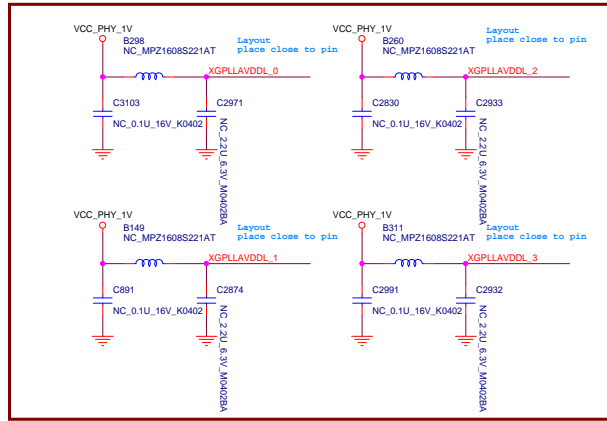


Agema Systems, INC.

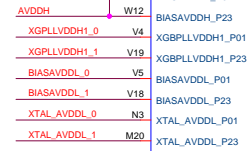
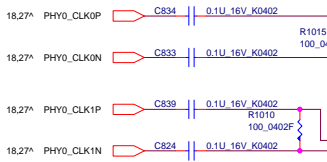
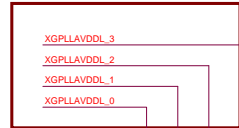
Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without written permission.

| | | | |
|------|----------------------|-----------------------------|----------------|
| File | 02-02_BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Date: | Tuesday, September 13, 2016 | Sheet 51 of 80 |

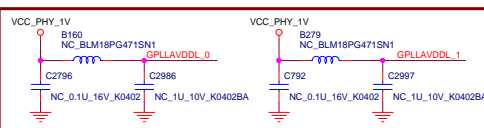
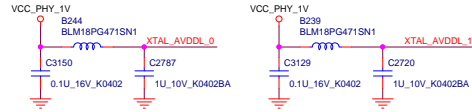
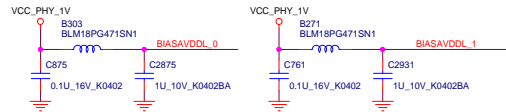
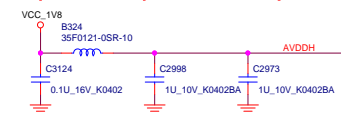
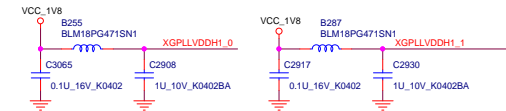




NC V6, V7, V16 and V17, 20150930

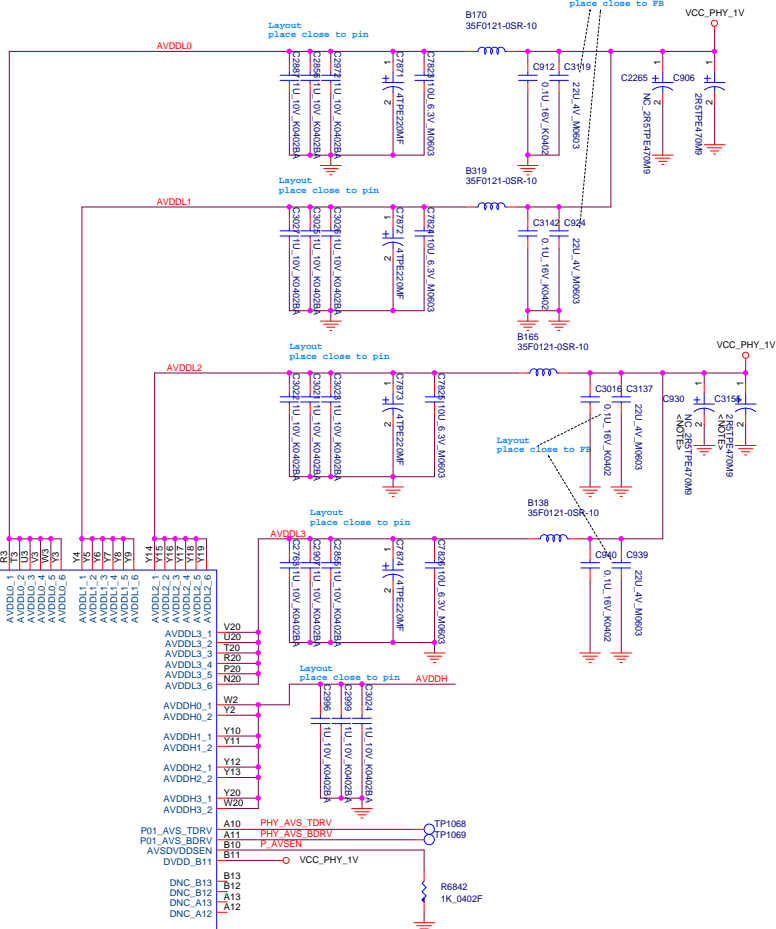


NC W7, W16, 20150930



NC GPLLAVDDL, 20150930

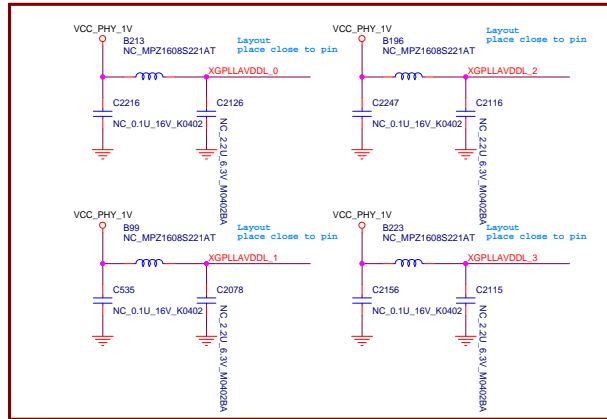
BCM84868B1KFE8G



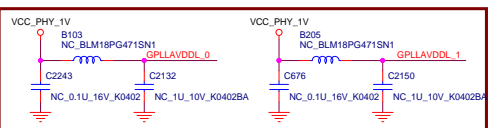
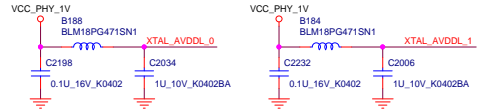
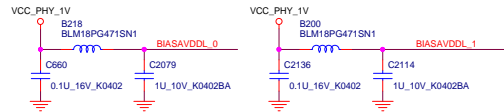
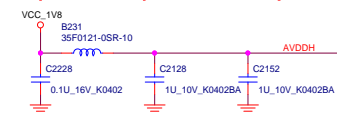
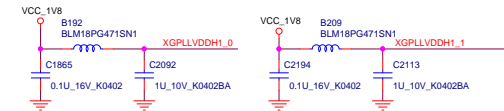
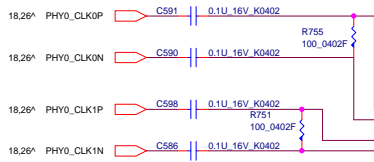
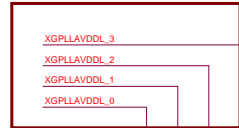
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

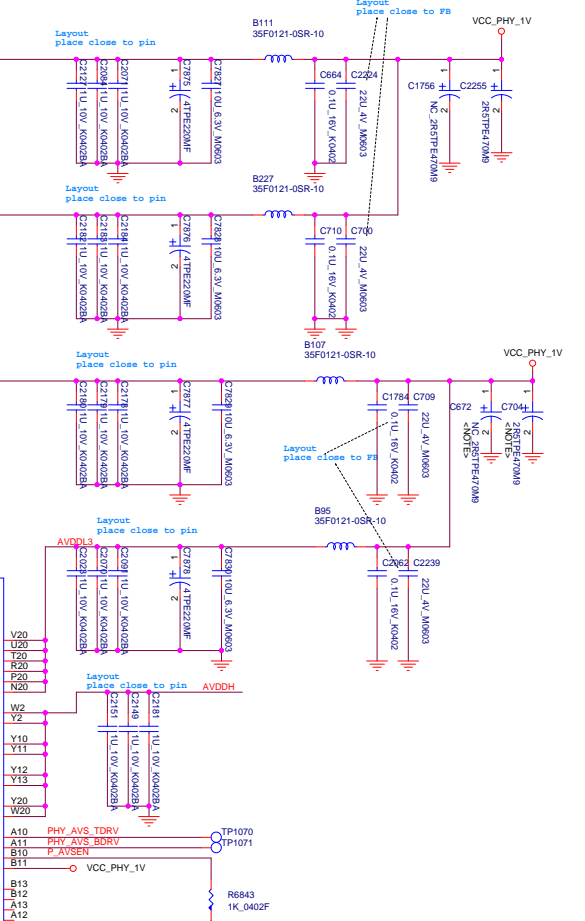
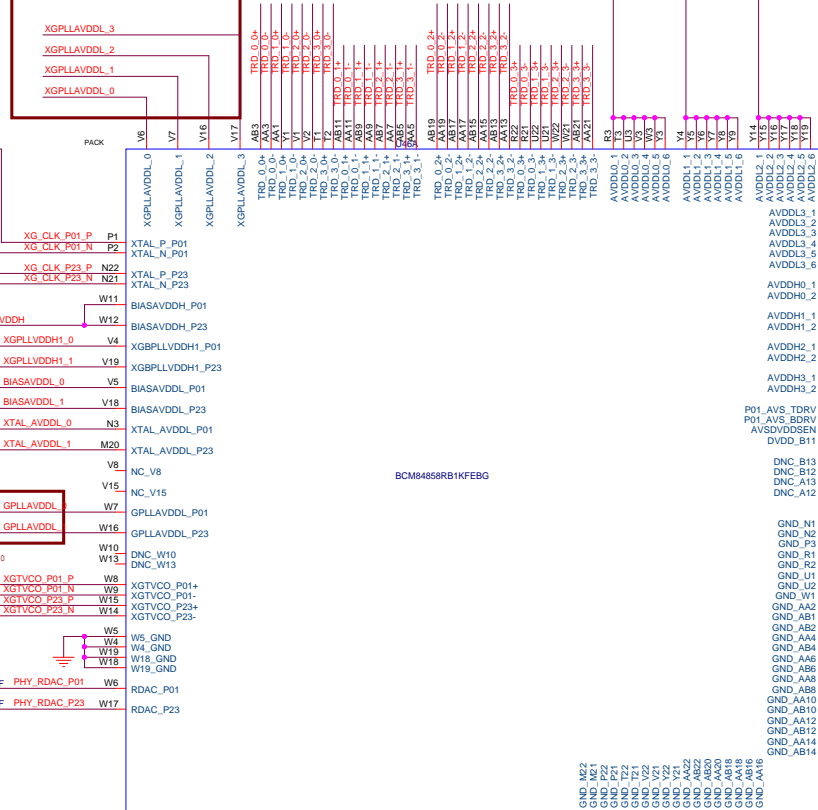
| | | | |
|------|----------------------|-----------------------------|----------------|
| File | 02-02 BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Date: | Tuesday, September 13, 2016 | Sheet 53 of 80 |



NC V6, V7, V16 and V17, 20150930



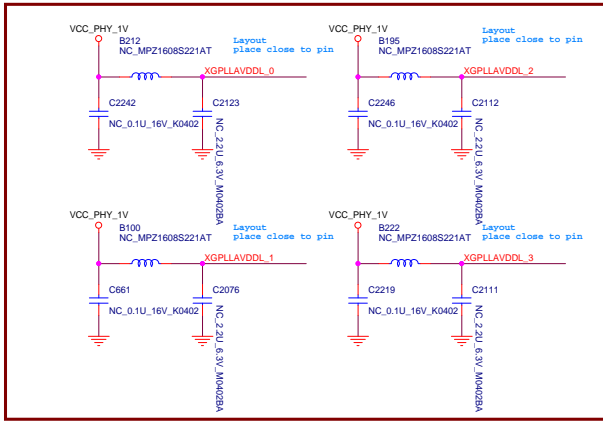
NC GPLLAVDDL, 20150930



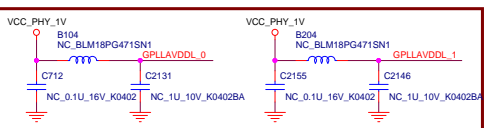
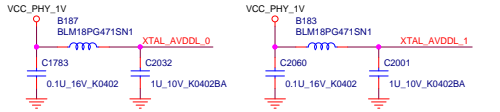
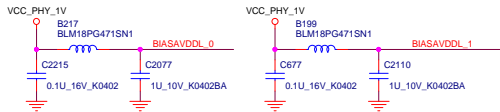
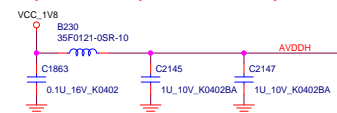
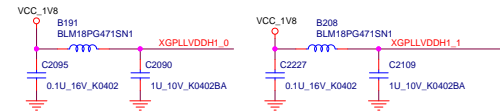
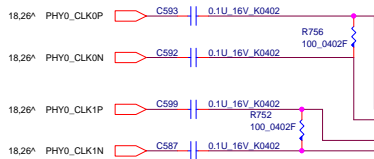
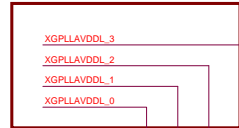
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without written permission.

| | | | |
|-------|-----------------------------|----------------|---------|
| File | 02-02_BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Document Number | 1ADSS-0XXXXX | |
| Date: | Tuesday, September 13, 2016 | Sheet 54 of 80 | |



NC V6, V7, V16 and V17, 20150930

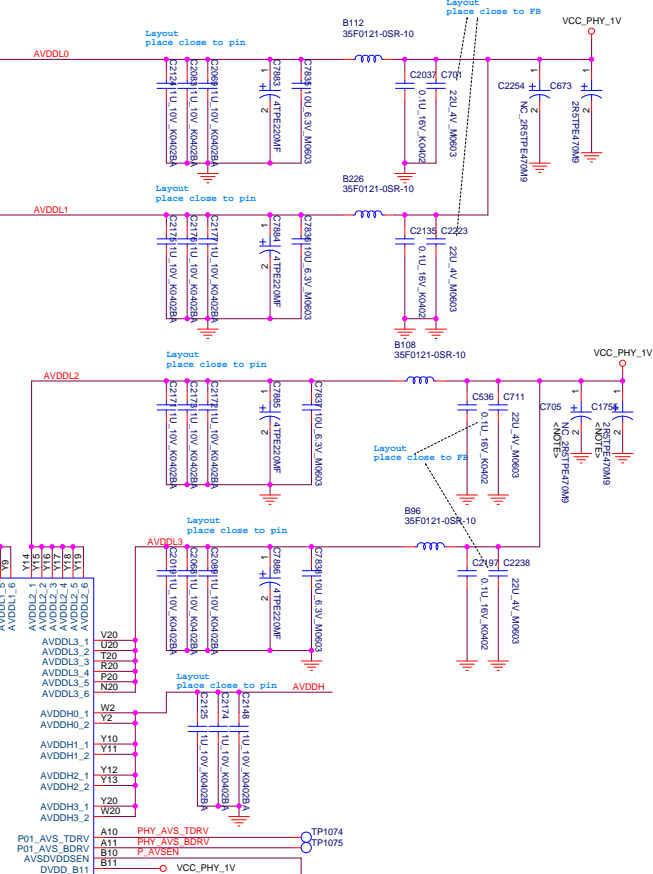
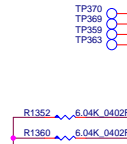


NC GPLLAVDDL, 20150930



BCM84858B1KFEGB

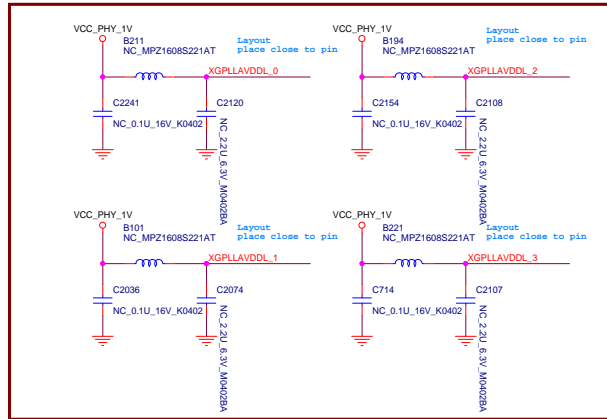
NC W7, W16, 20150930



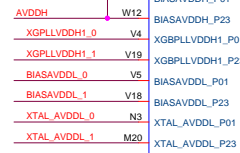
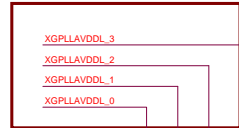
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

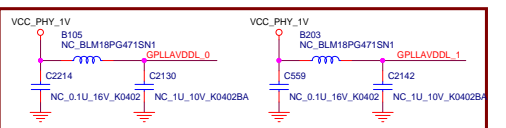
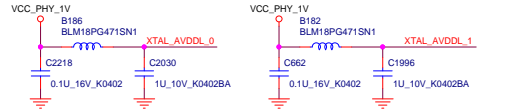
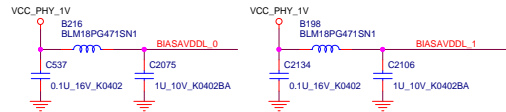
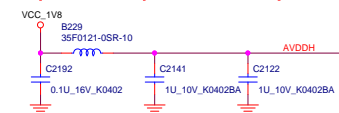
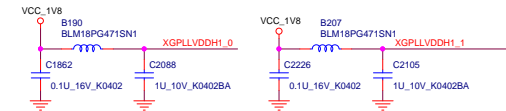
| | | | |
|-------|-----------------------------|----------------|---------|
| File | 02-02_BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Document Number | 1ADSS-0XXXXX | |
| Date: | Tuesday, September 13, 2016 | Sheet 56 of 80 | |



NC V6, V7, V16 and V17, 20150930

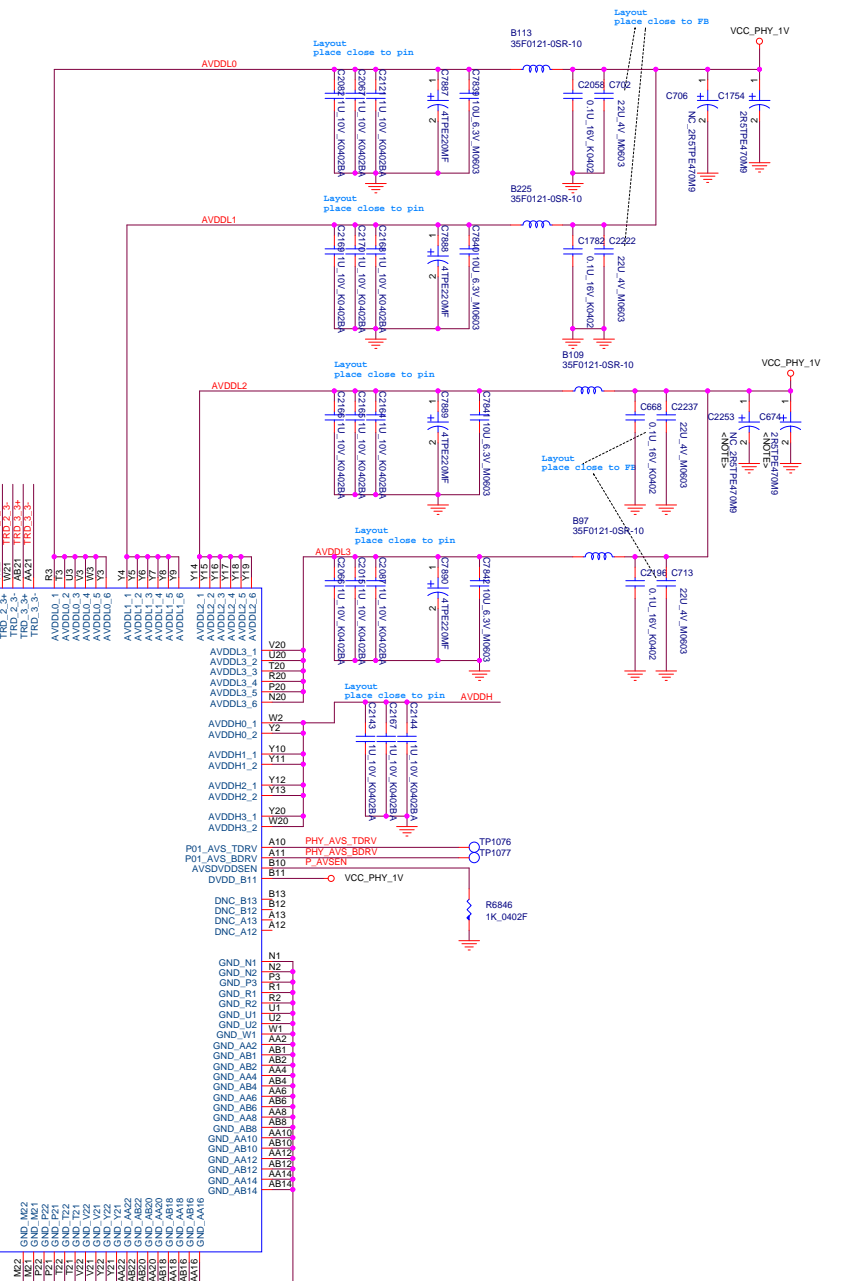


NC W7, W16, 20150930



NC GPLLAVDDL, 20150930

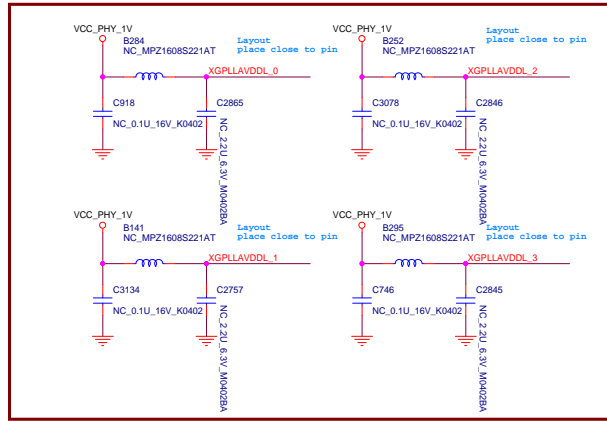
BCM84858B1KFEGB



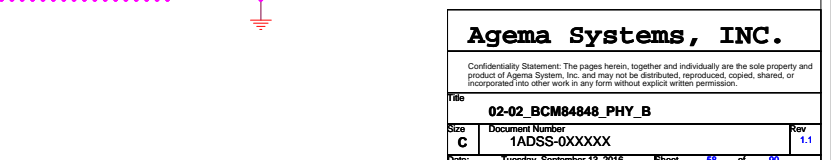
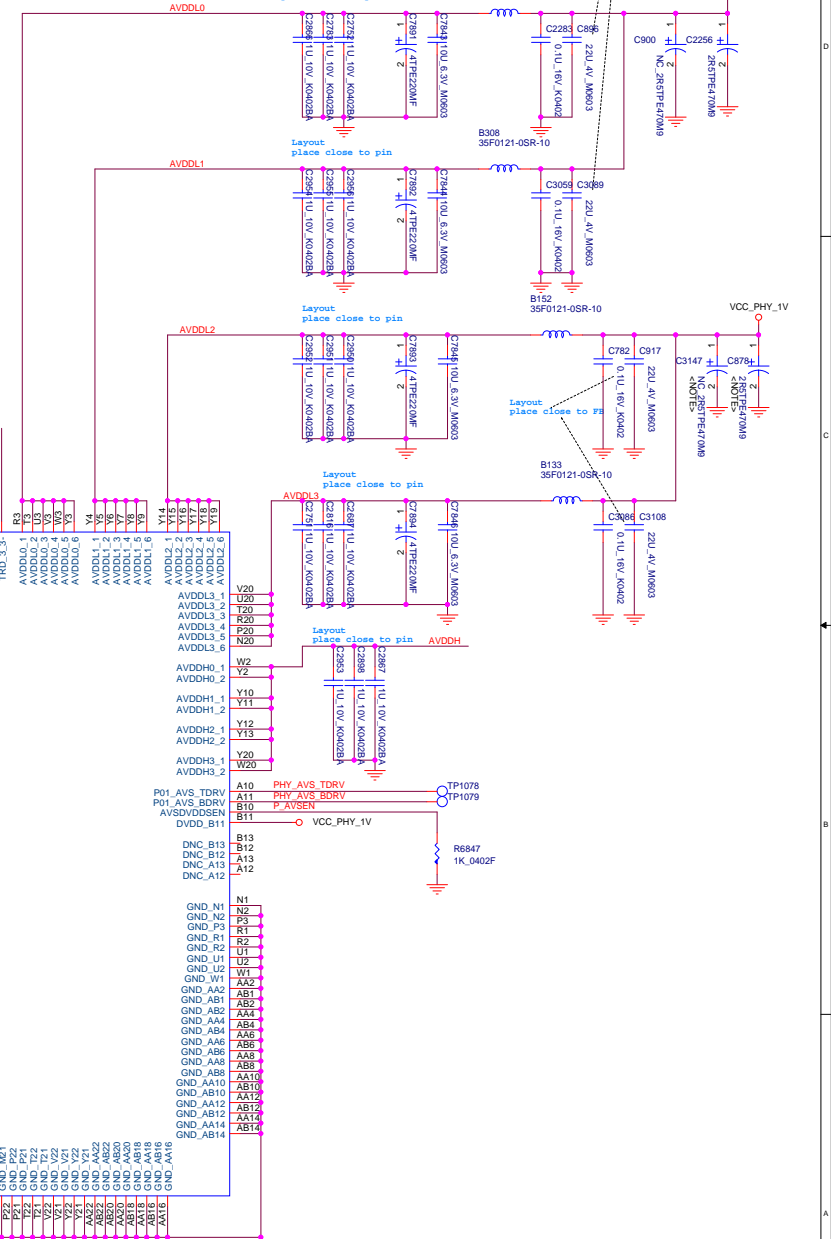
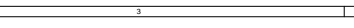
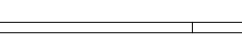
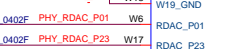
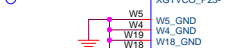
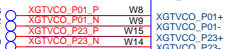
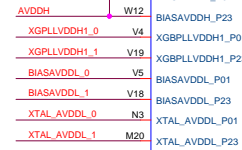
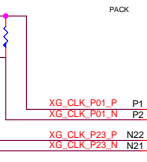
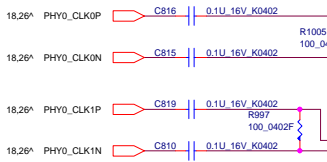
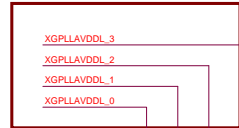
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|----------------|---------|
| File | 02-02_BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 57 of 80 | |



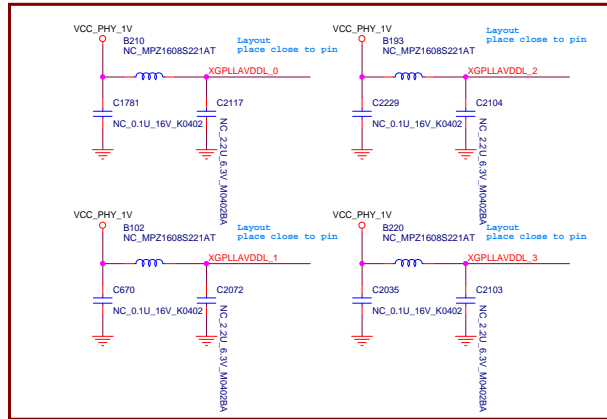
NC V6, V7, V16 and V17, 20150930



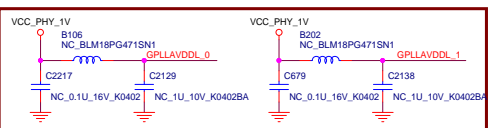
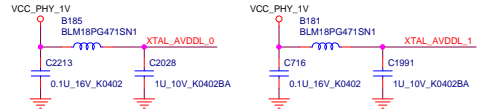
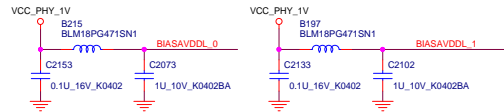
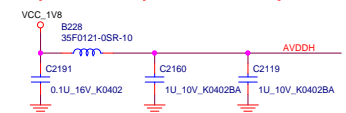
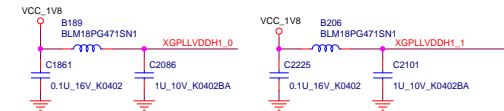
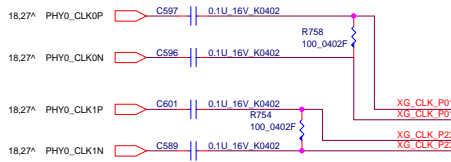
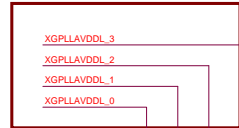
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-02_BCM84848_PHY_B | Rev | 1.1 |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 58 of 60 |



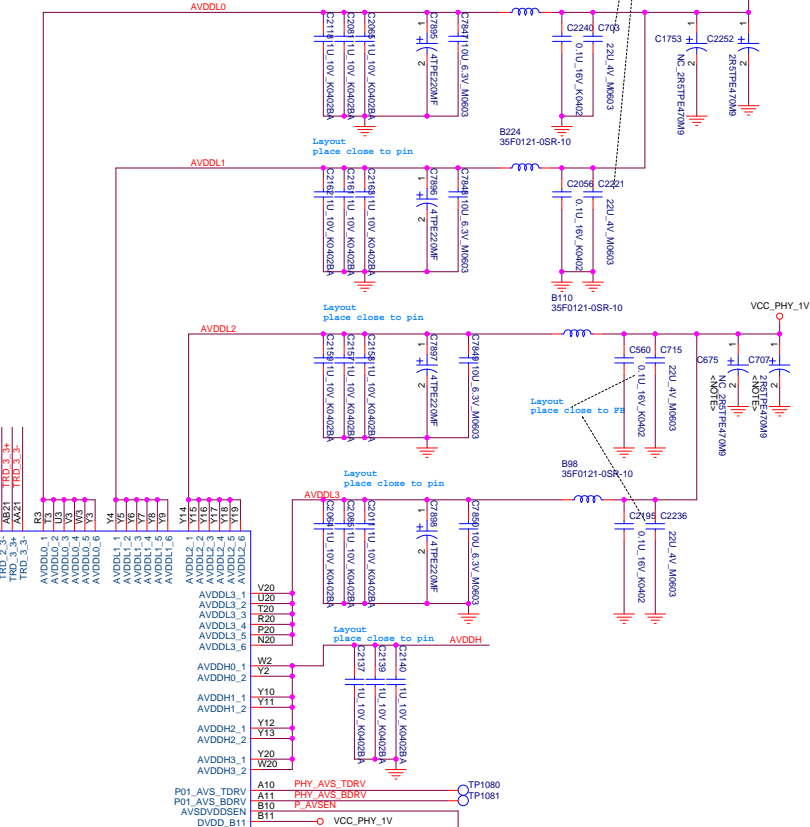
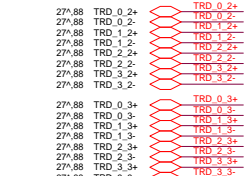
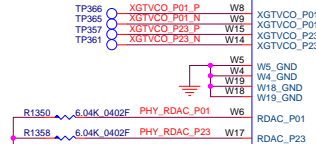
NC V6_V7,V16 and V17, 20150930



NC GPLLAVDDL, 20150930

BCM84858RB1KFEGB

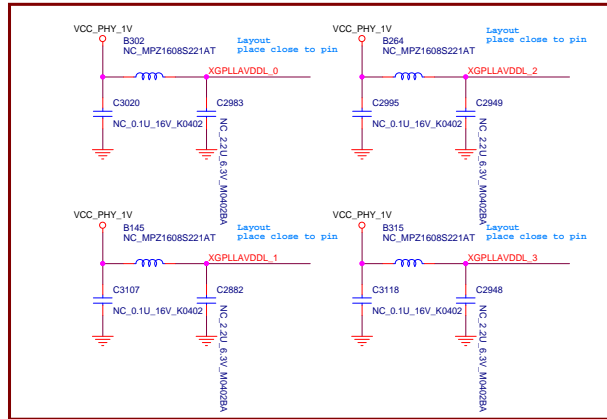
NC W7,W16, 20150930



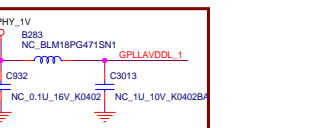
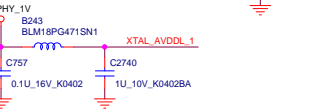
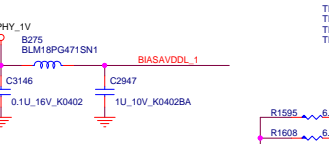
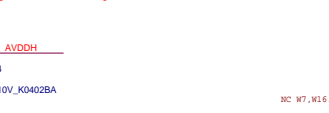
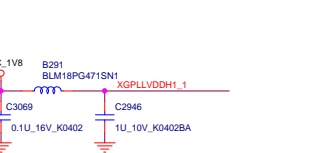
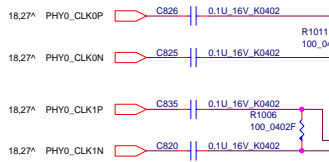
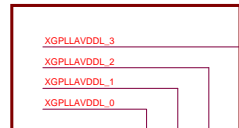
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

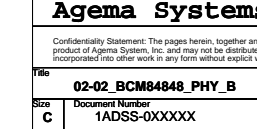
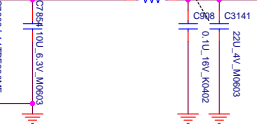
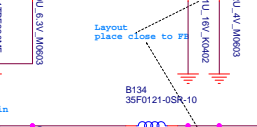
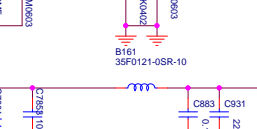
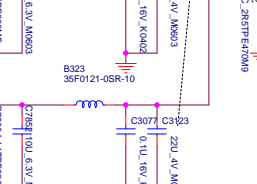
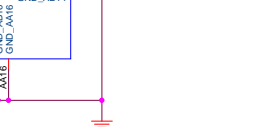
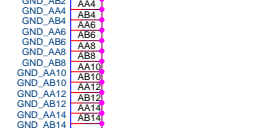
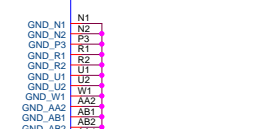
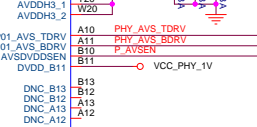
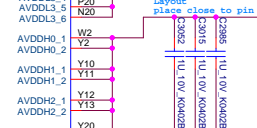
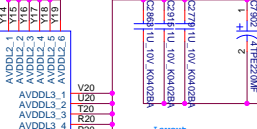
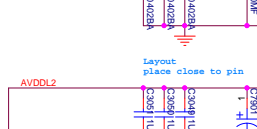
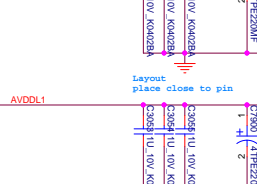
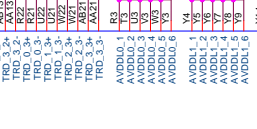
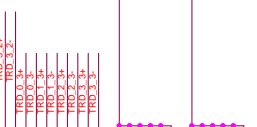
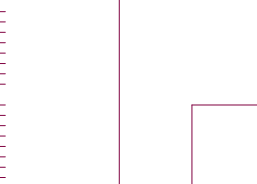
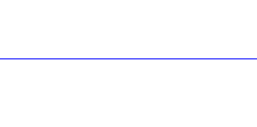
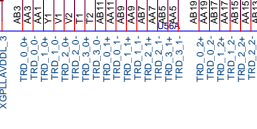
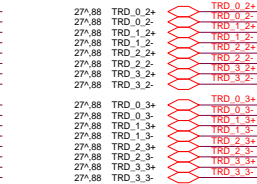
| | | | |
|-------|-----------------------------|----------------|---------|
| File | 02-02_BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 59 of 80 | |



NC V6, V7, V16 and V17, 20150930



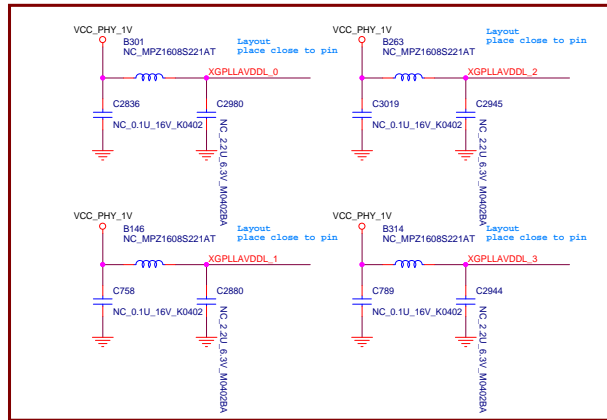
NC GPLLAVDDL, 20150930



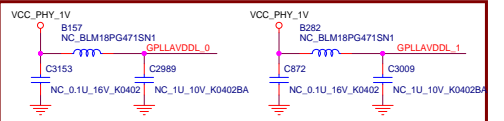
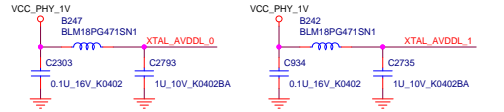
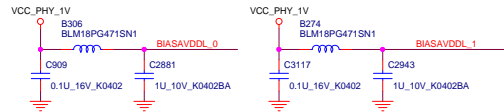
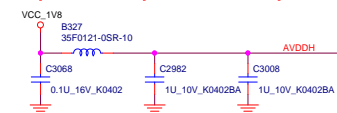
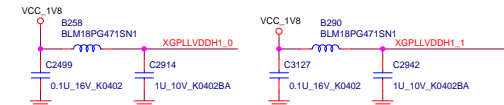
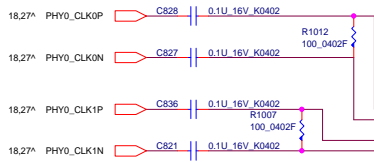
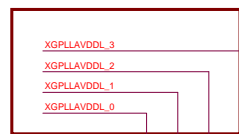
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

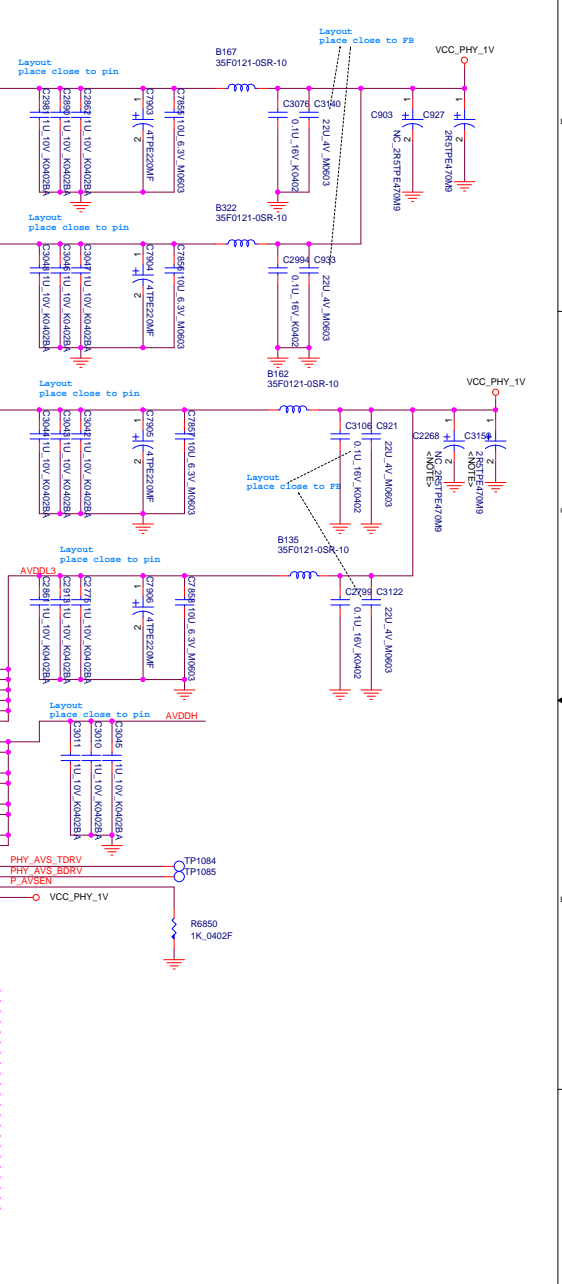
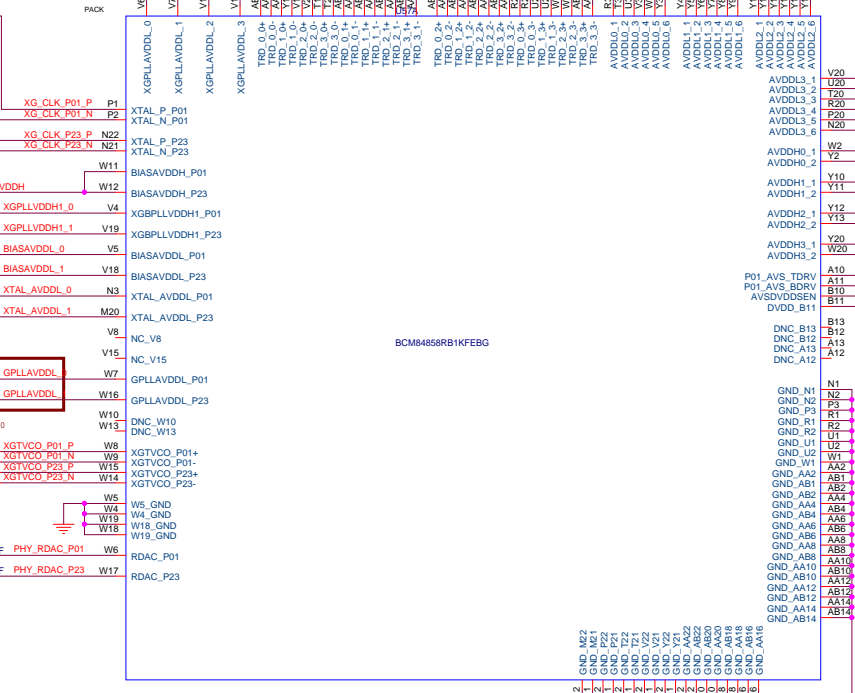
| | | | |
|------|----------------------|-----------------------------|----------------|
| File | 02-02_BCM84848_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Date: | Tuesday, September 13, 2016 | Sheet 80 of 80 |



NC V6, V7, V16 and V17, 20150930



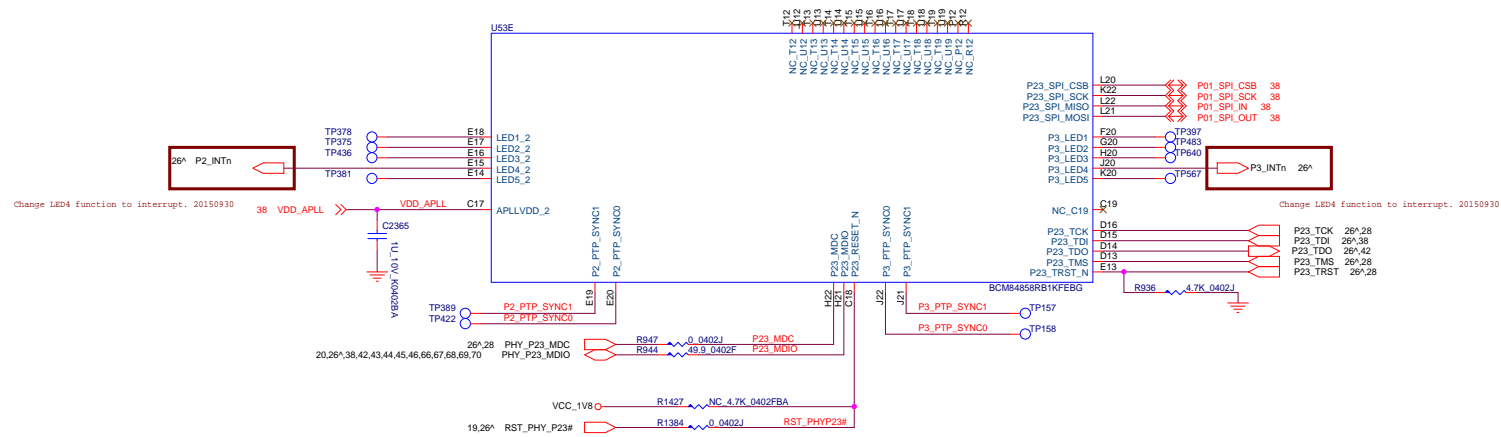
NC GPLLAVDDL, 20150930



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

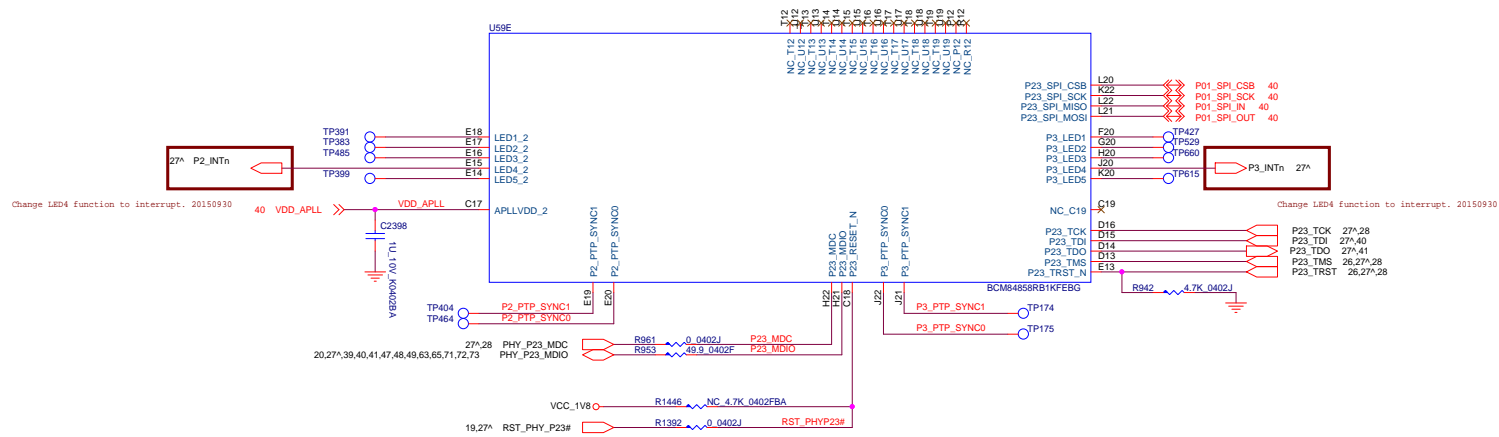
| | | | |
|-------|-----------------------------|----------------|---------|
| File | 02-02_BCM8488_PHY_B | | |
| Size | Document Number | 1ADSS-0XXXXX | Rev 1.1 |
| C | Document Number | 1ADSS-0XXXXX | |
| Date: | Tuesday, September 13, 2016 | Sheet 81 of 80 | |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

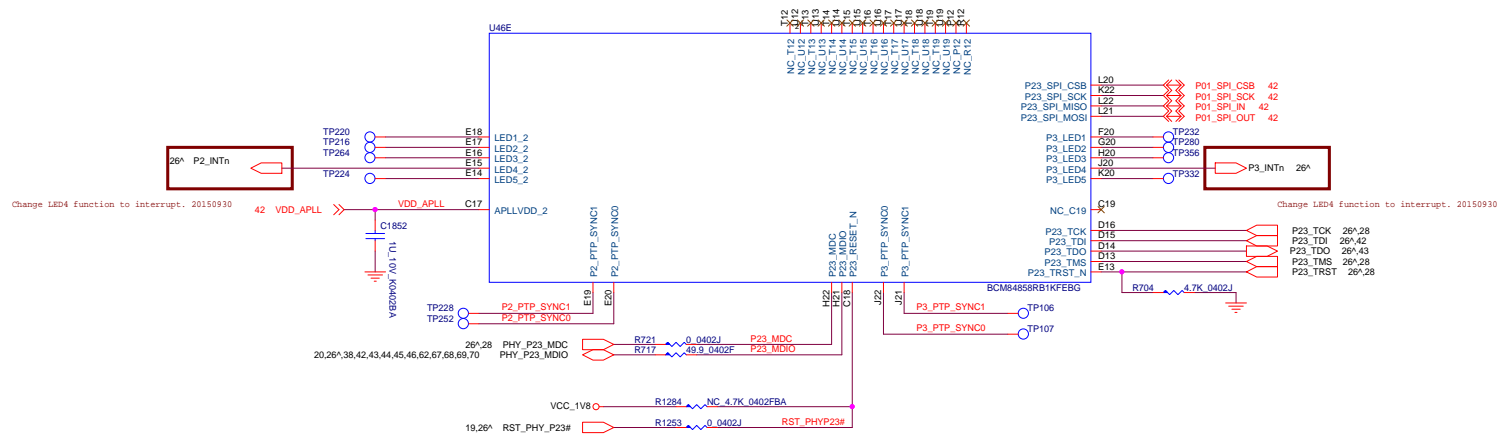
| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-03_BCM84848_PHY_C | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 62 of 80 |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

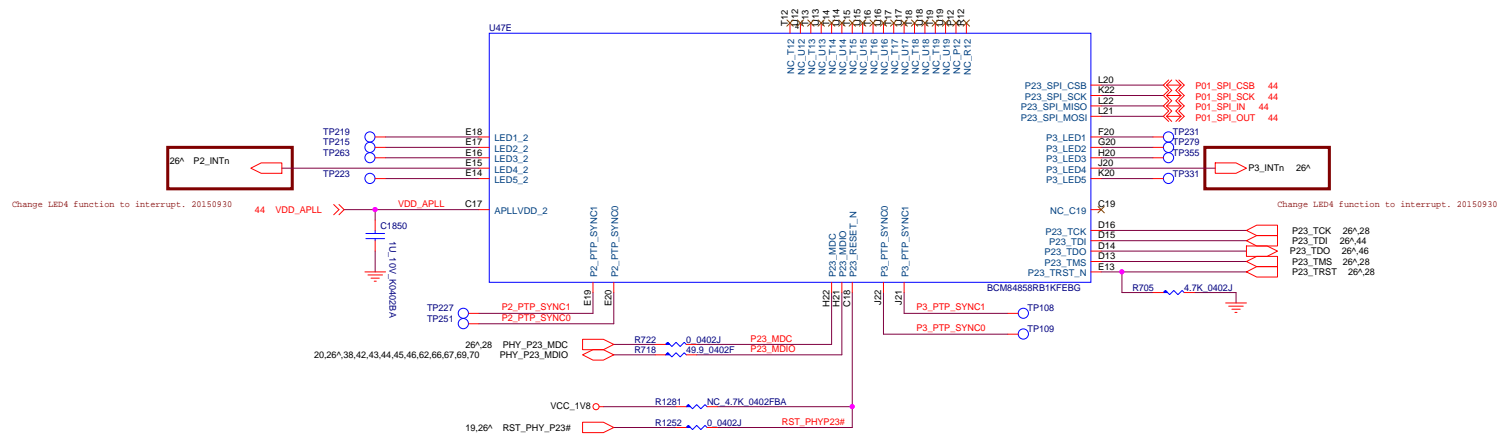
| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-03_BCM84848_PHY_C | | |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | Rev | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet | 64 of 80 |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

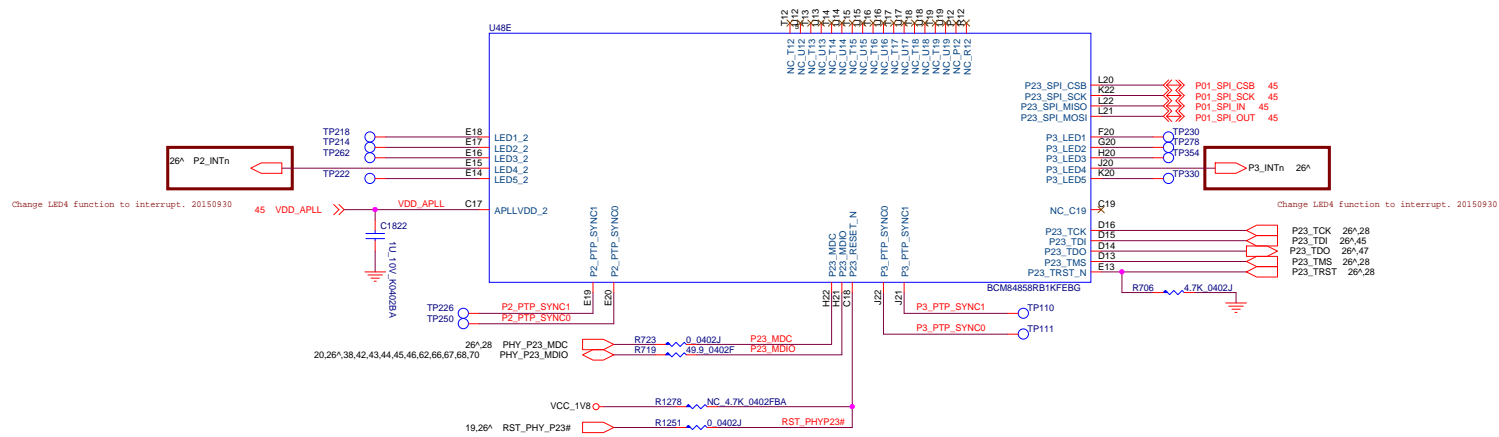
| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-03_BCM84848_PHY_C | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 66 of 80 |

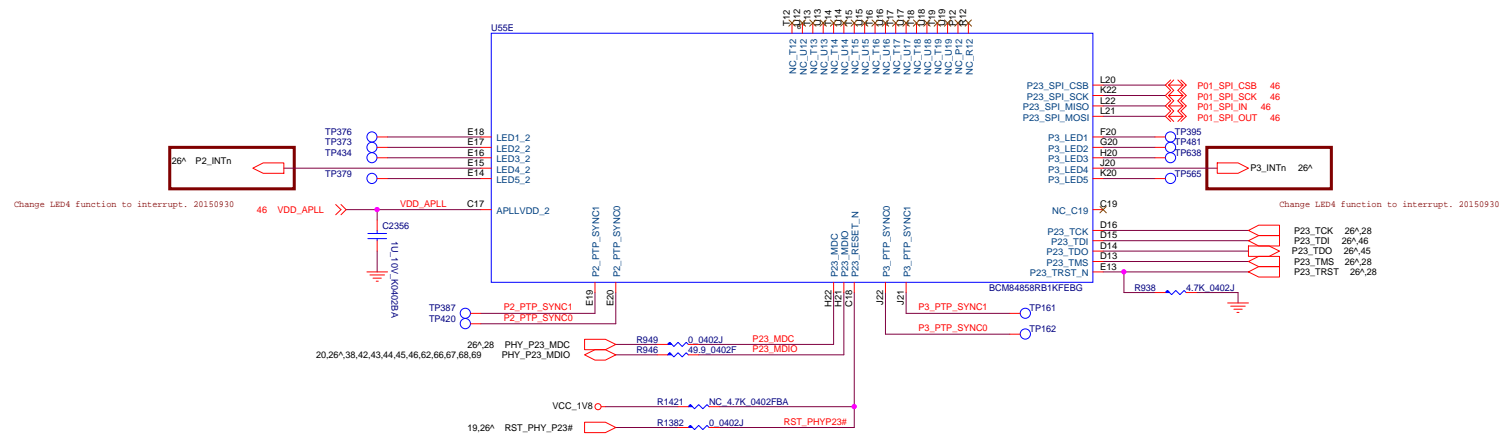


Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|----------------------|----------|
| File | | 02-03_BCM84848_PHY_C | |
| Size | Document Number | 1ADSS-0XXXXX | Rev |
| C | | | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet | 68 of 80 |

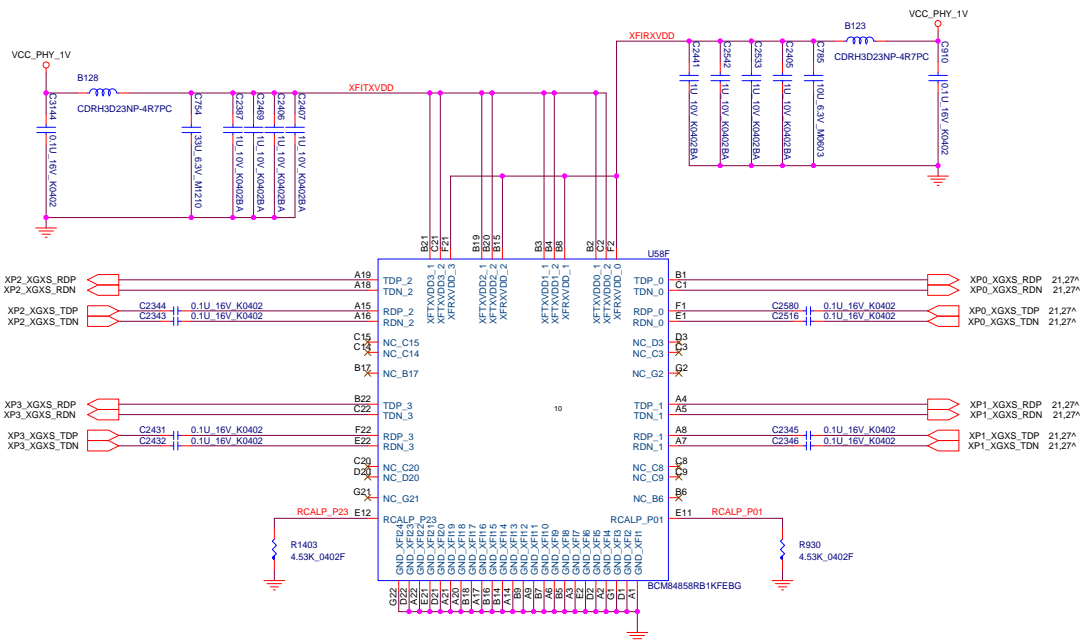


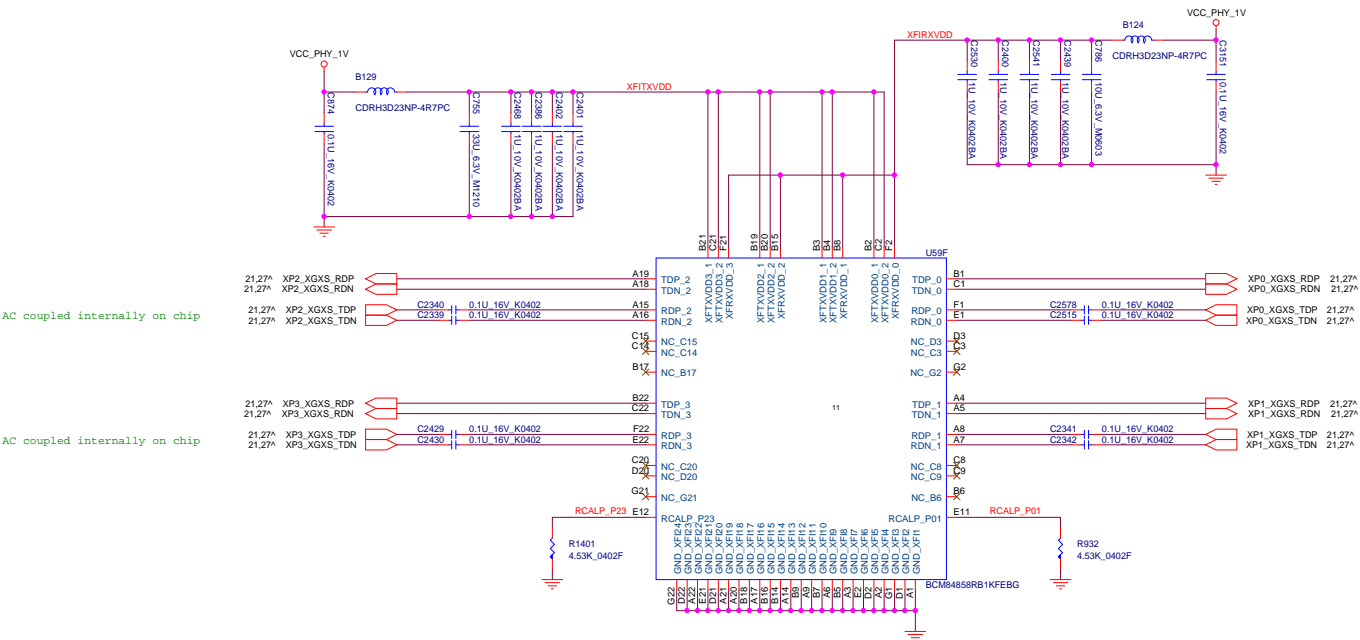


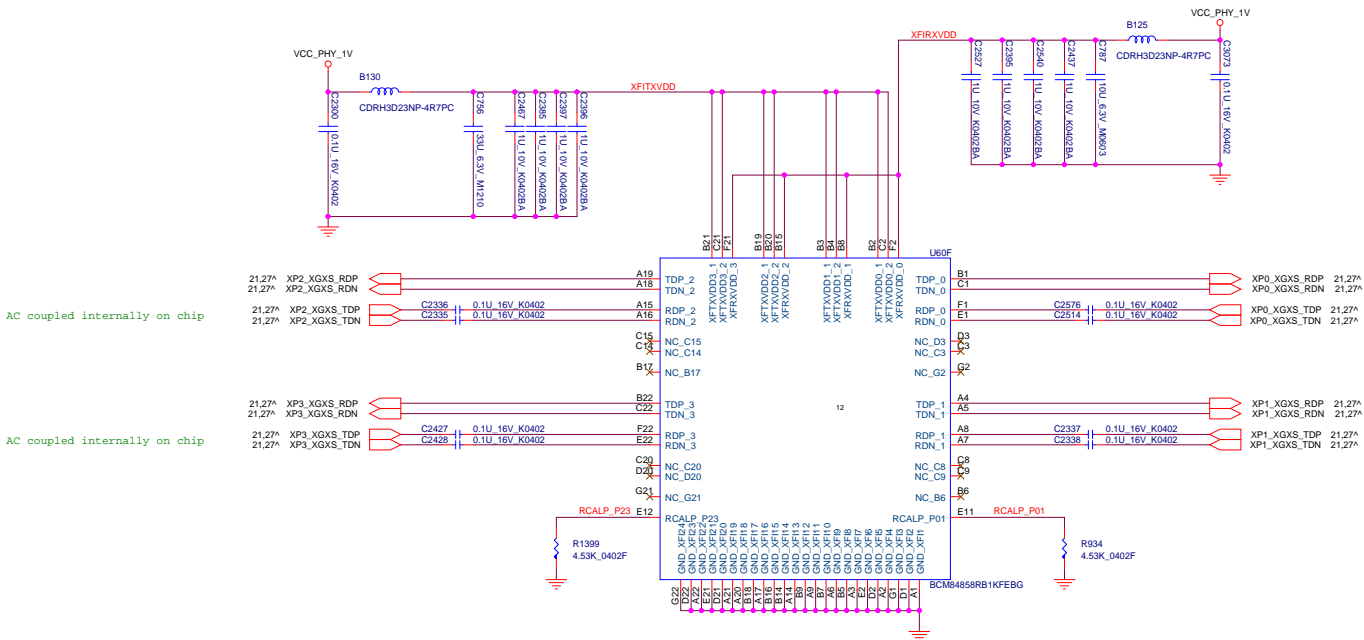
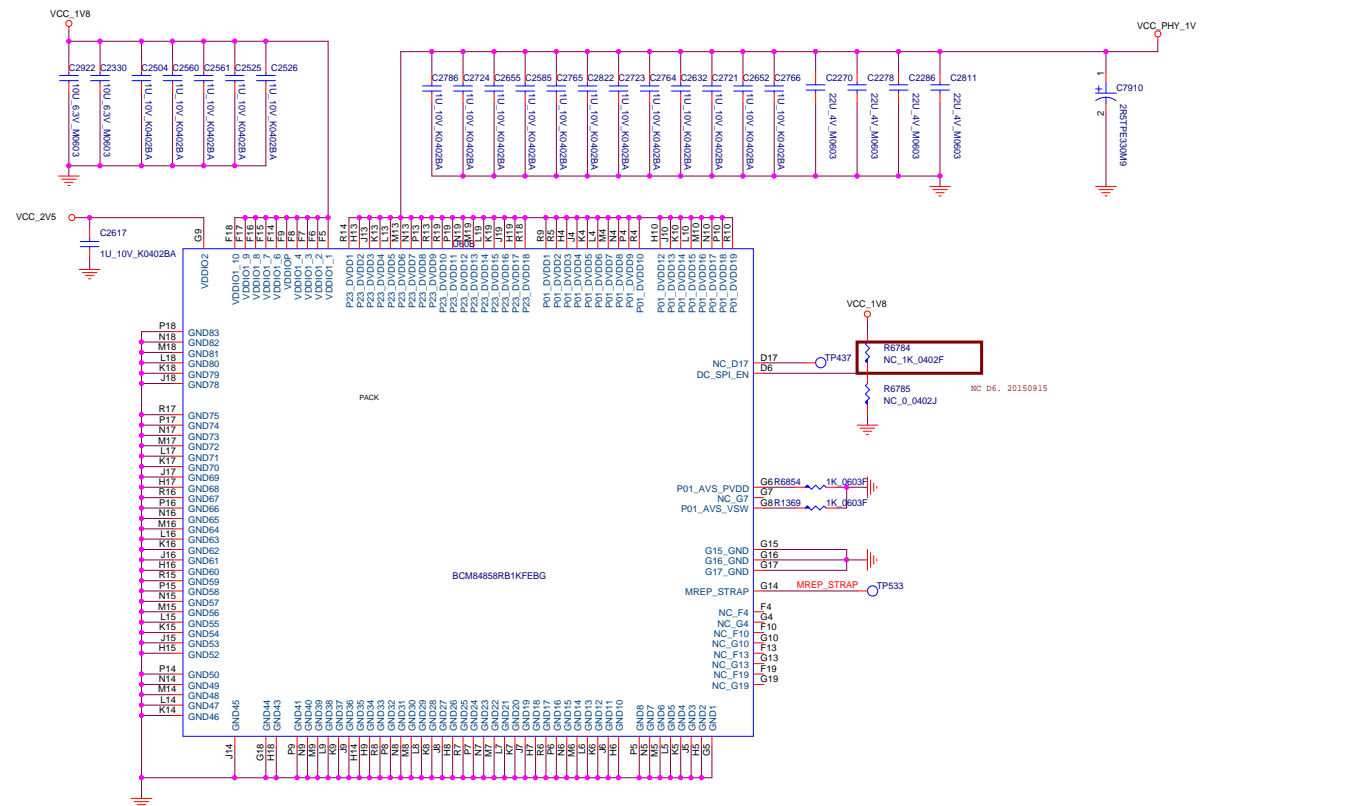
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-03_BCM84848_PHY_C | | |
| Size | Document Number | Rev | |
| C | 1ADSS-0XXXXX | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 70 of 80 |



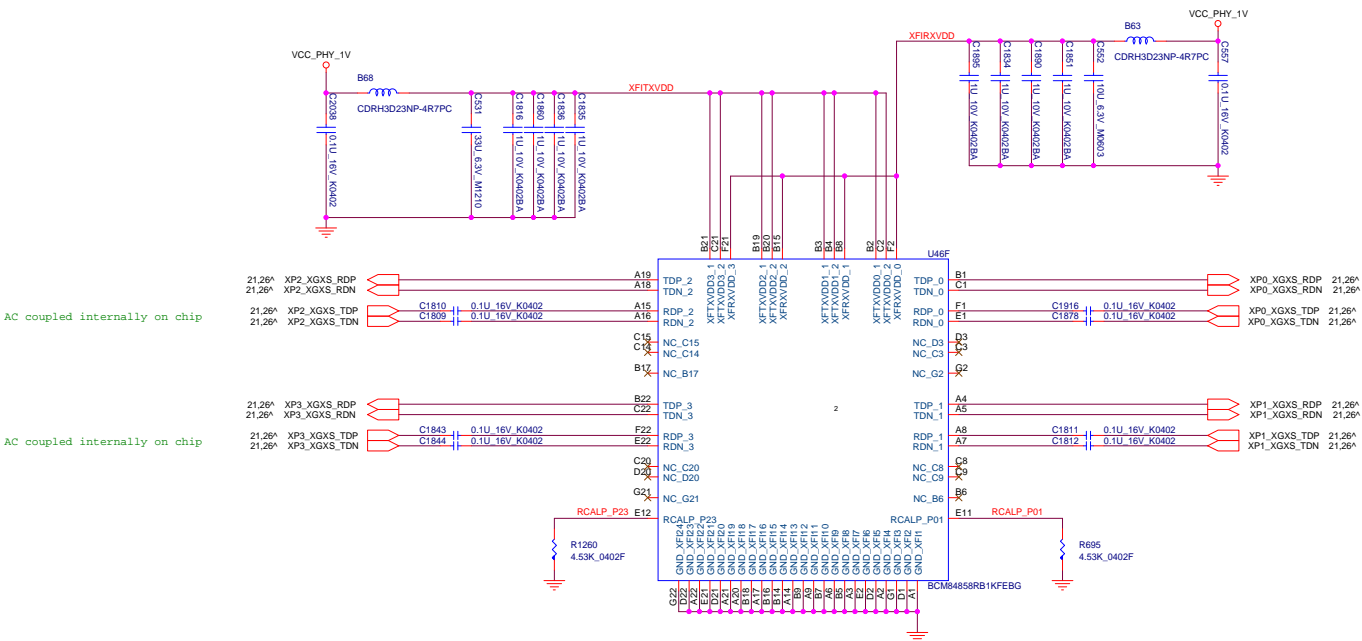


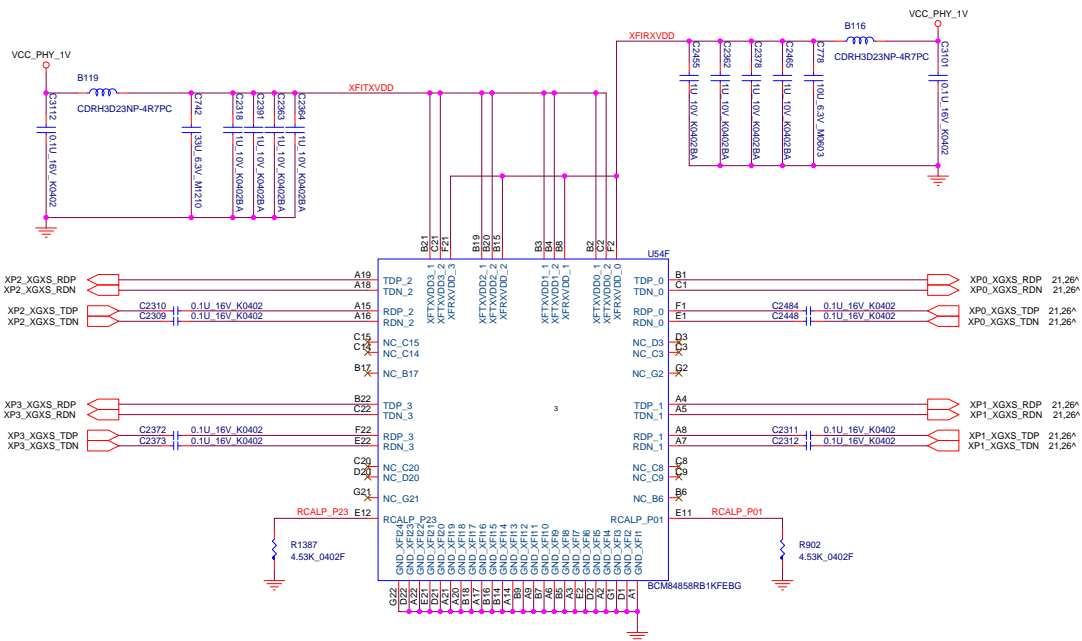


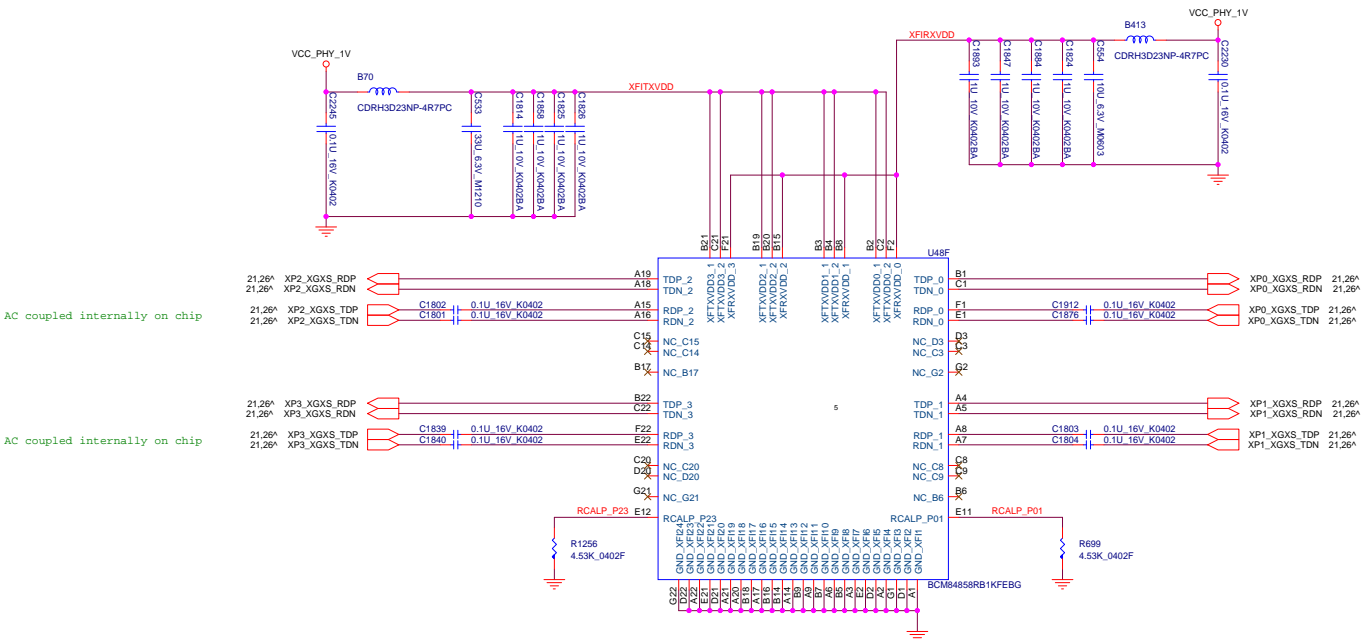
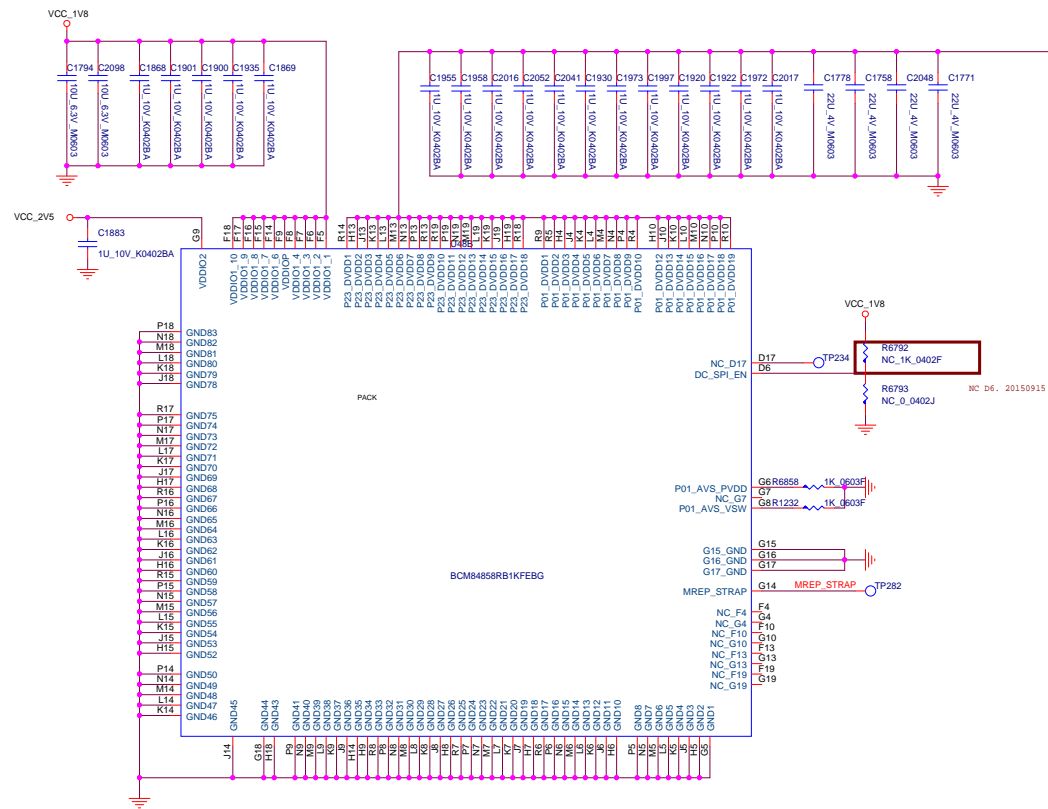
Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-04_BCM84848_PHY_D | | |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | Rev | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet | 77 of 80 |



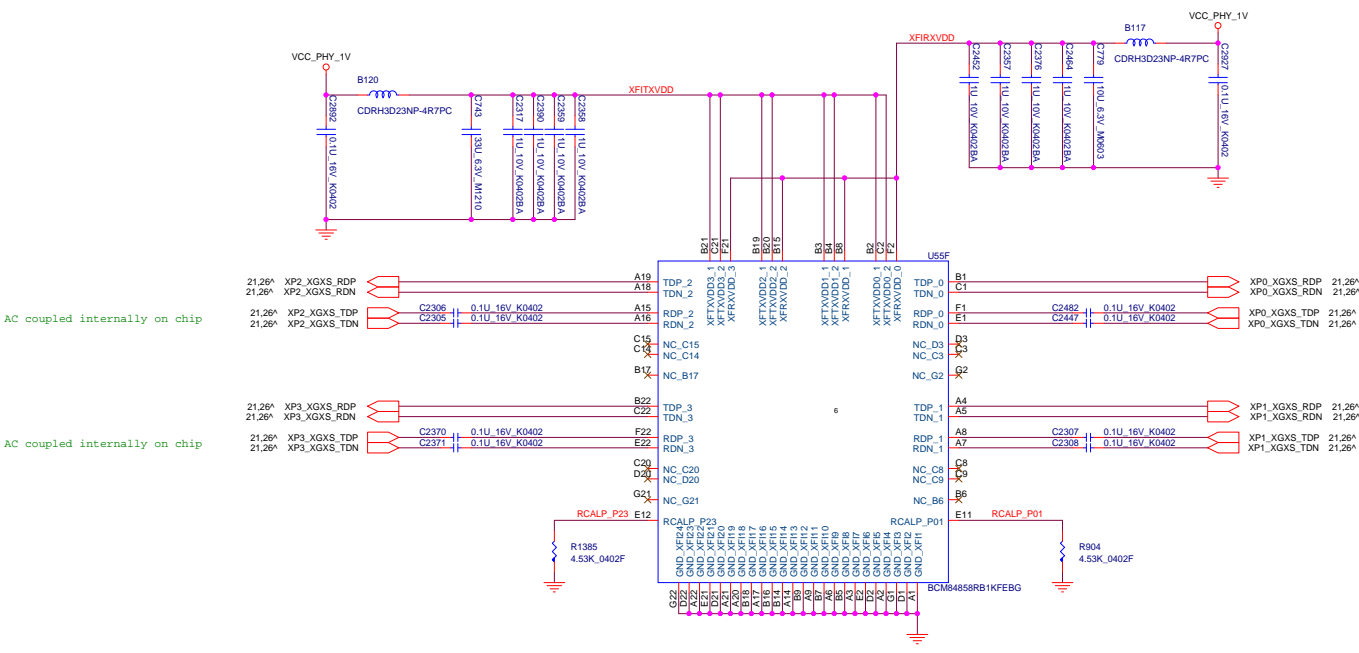
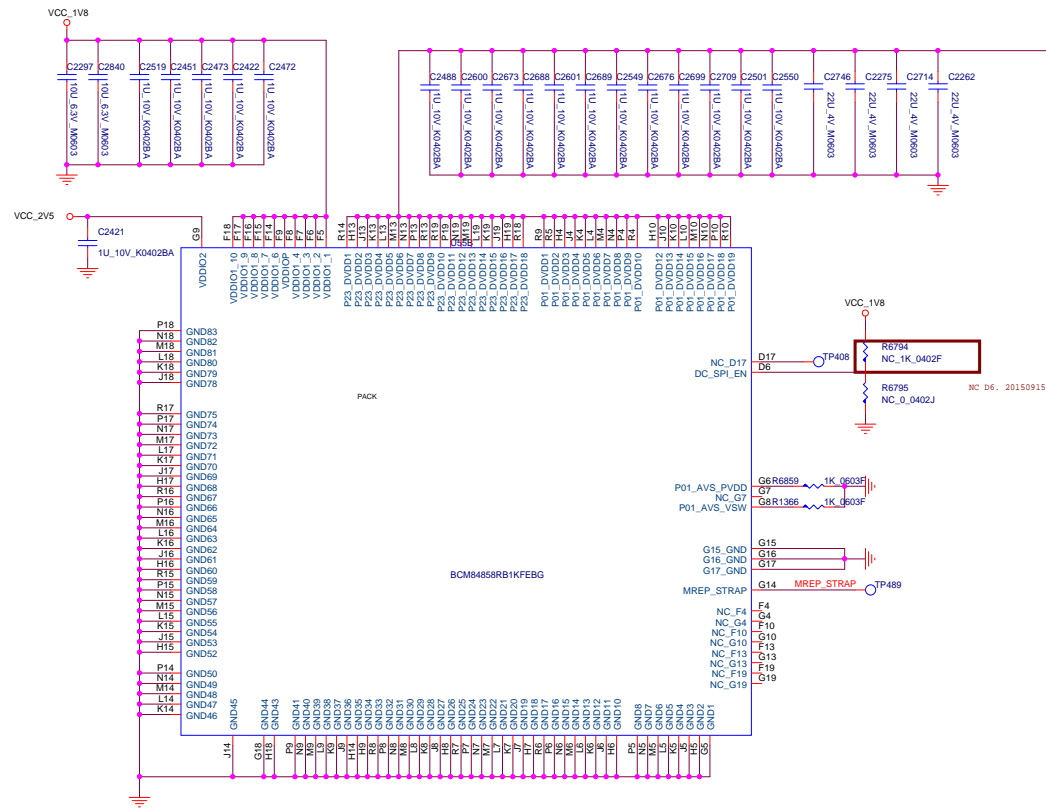




Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

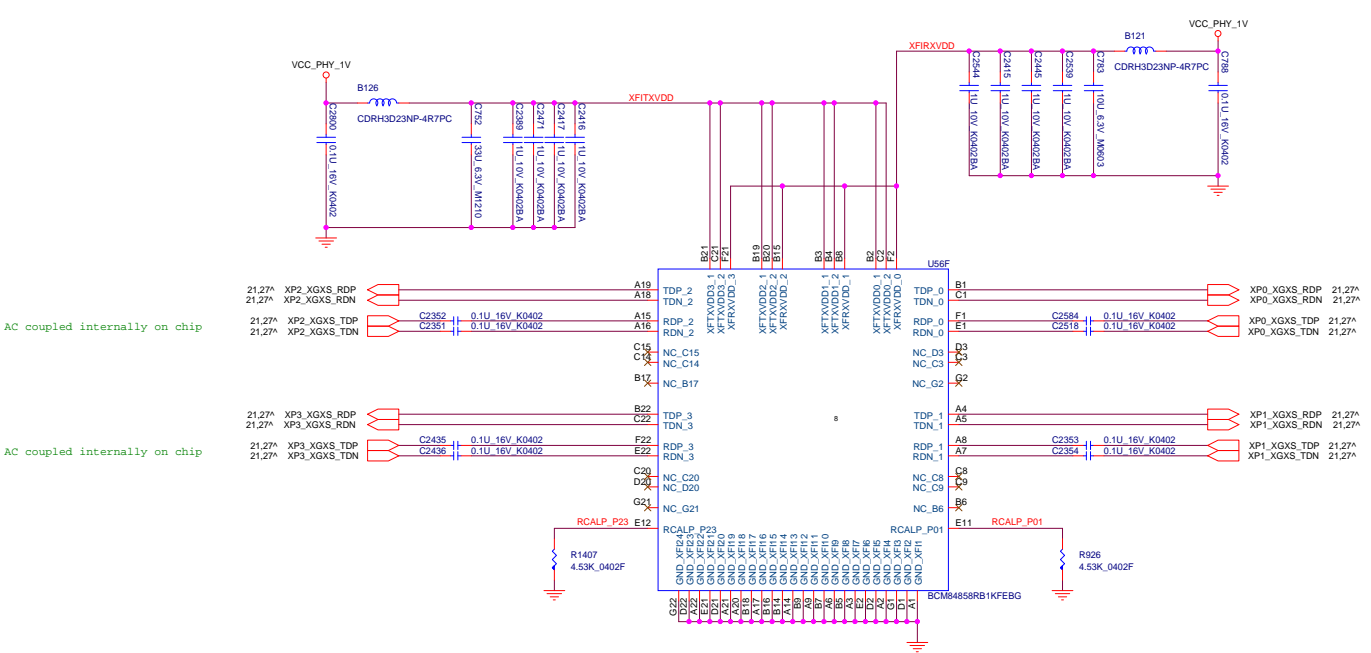
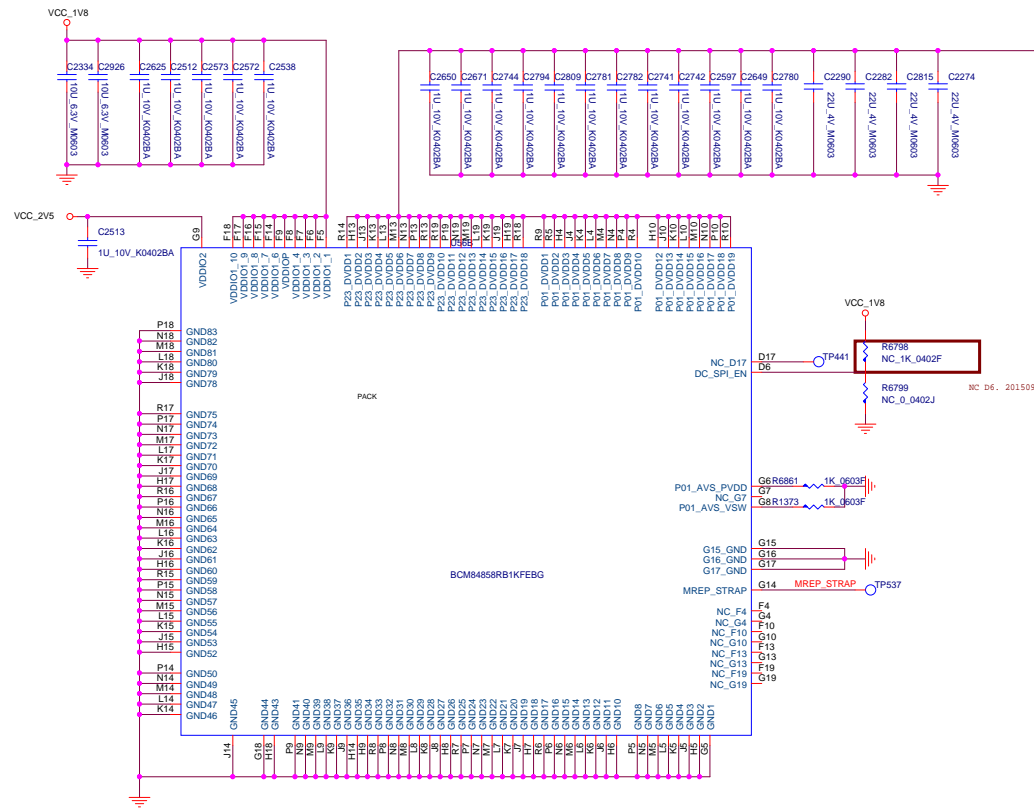
| | | | |
|-------|-----------------------------|--------------|----------|
| File | 02-04_BCM84848_PHY_D | | |
| Size | Document Number | 1ADSS-0XXXXX | |
| C | Rev | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 81 of 80 |



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|--------------|----------|
| File | 02-04_BCM84848_PHY_D | | |
| Size | Document Number | 1ADSS-0XXXXX | |
| C | Rev | 1.1 | |
| Date: | Tuesday, September 13, 2016 | Sheet | 82 of 80 |

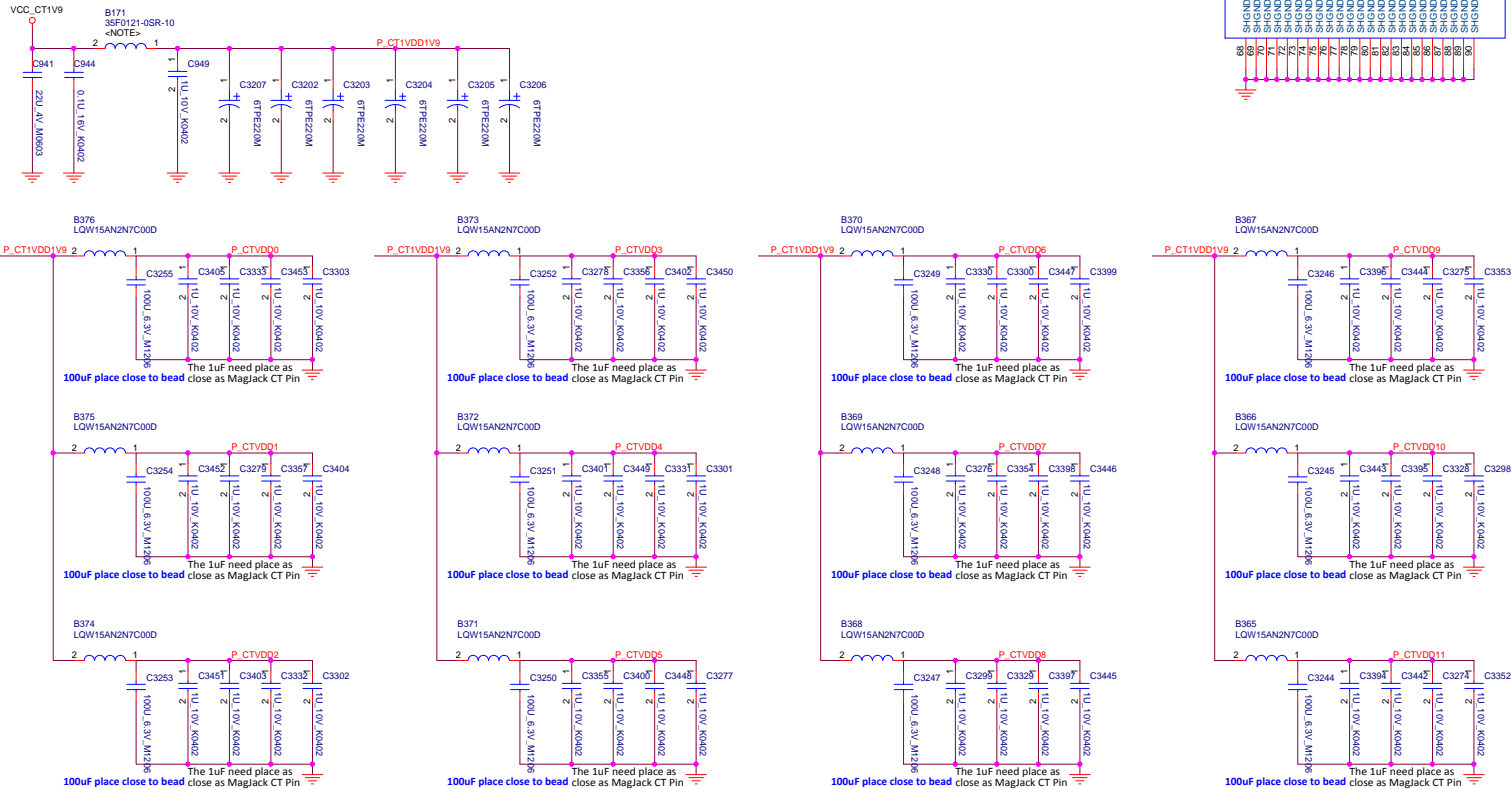
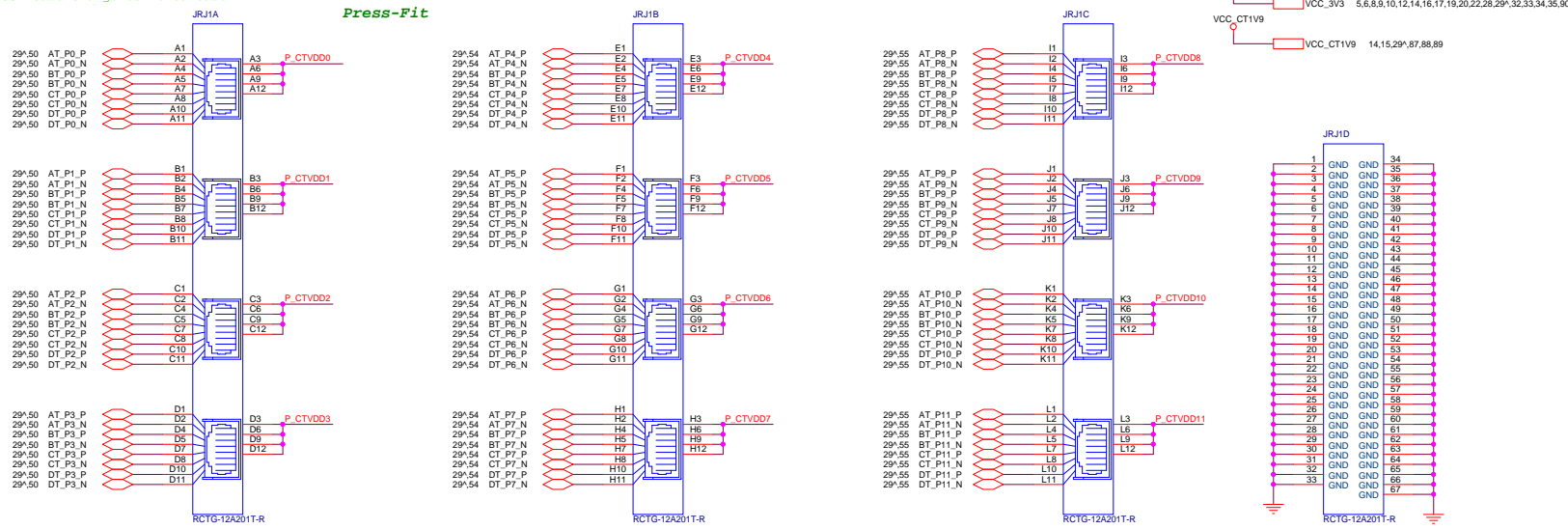


Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema System, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 02-04_BCM84848_PHY_D | | |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 84 of 80 |

Press-Fit

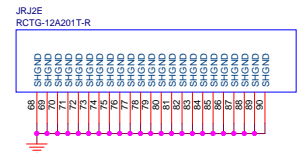
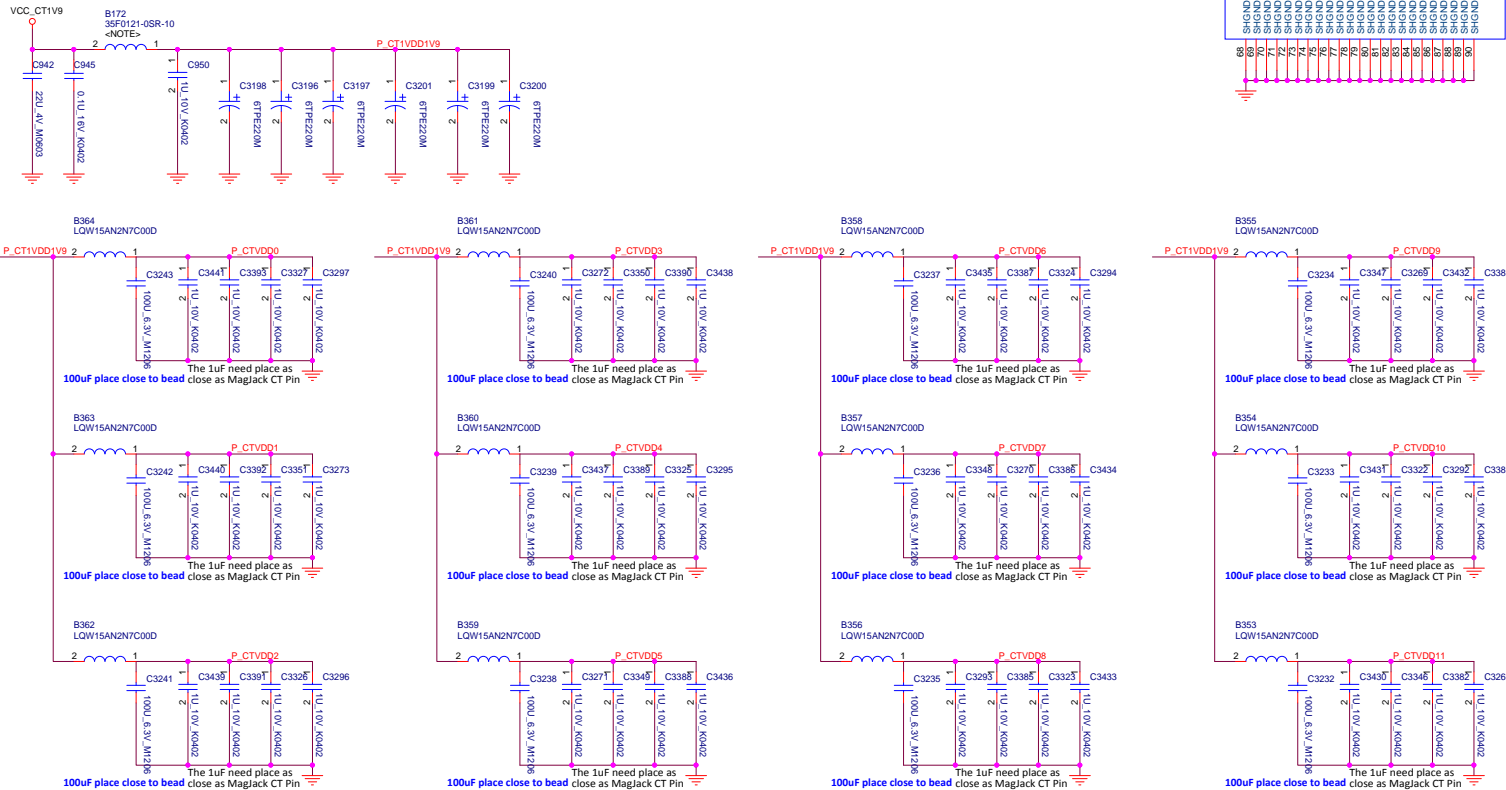
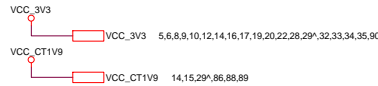
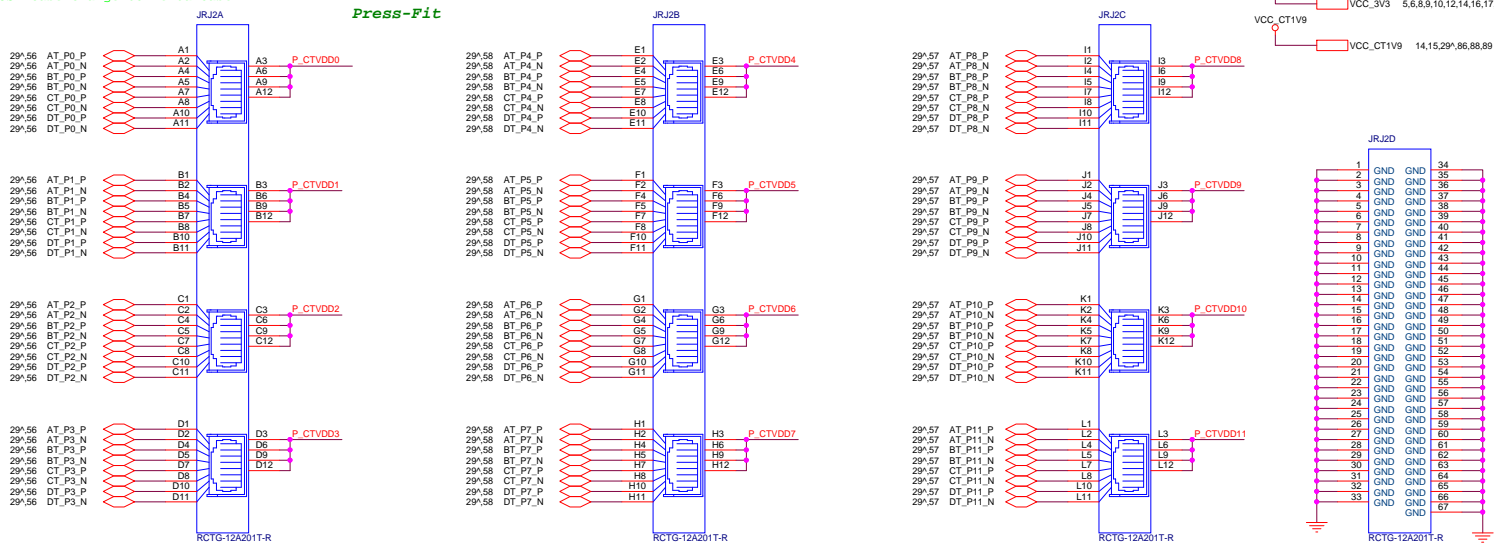


Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | | |
|-------|-----------------------------|-------|----------|
| File | 03-01_10GB RJ-45_2x6 | | |
| Size | Document Number | | |
| C | 1ADSS-0XXXXX | | |
| Date: | Tuesday, September 13, 2016 | Sheet | 85 of 80 |

Press-Fit



Agema Systems, INC.

Confidentiality Statement: The pages herein, together and individually are the sole property and product of Agema Systems, Inc. and may not be distributed, reproduced, copied, shared, or incorporated into other work in any form without explicit written permission.

| | | |
|-------|-----------------------------|----------------|
| File | 03-01_10GBT_RJ-45_2x6 | |
| Size | Document Number | Rev |
| C | 1ADSS-0XXXXX | 1.1 |
| Date: | Tuesday, September 13, 2016 | Sheet 87 of 90 |

