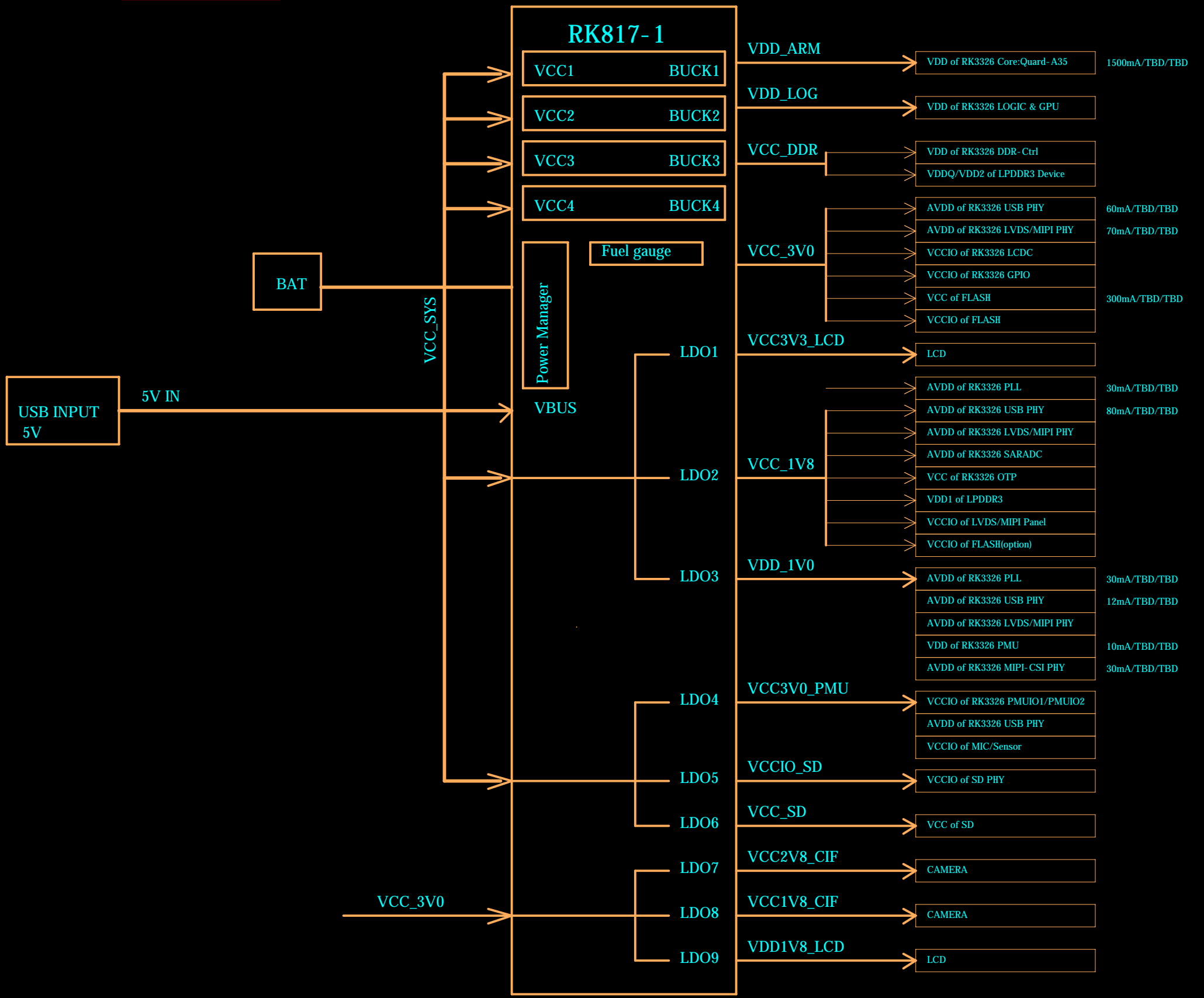


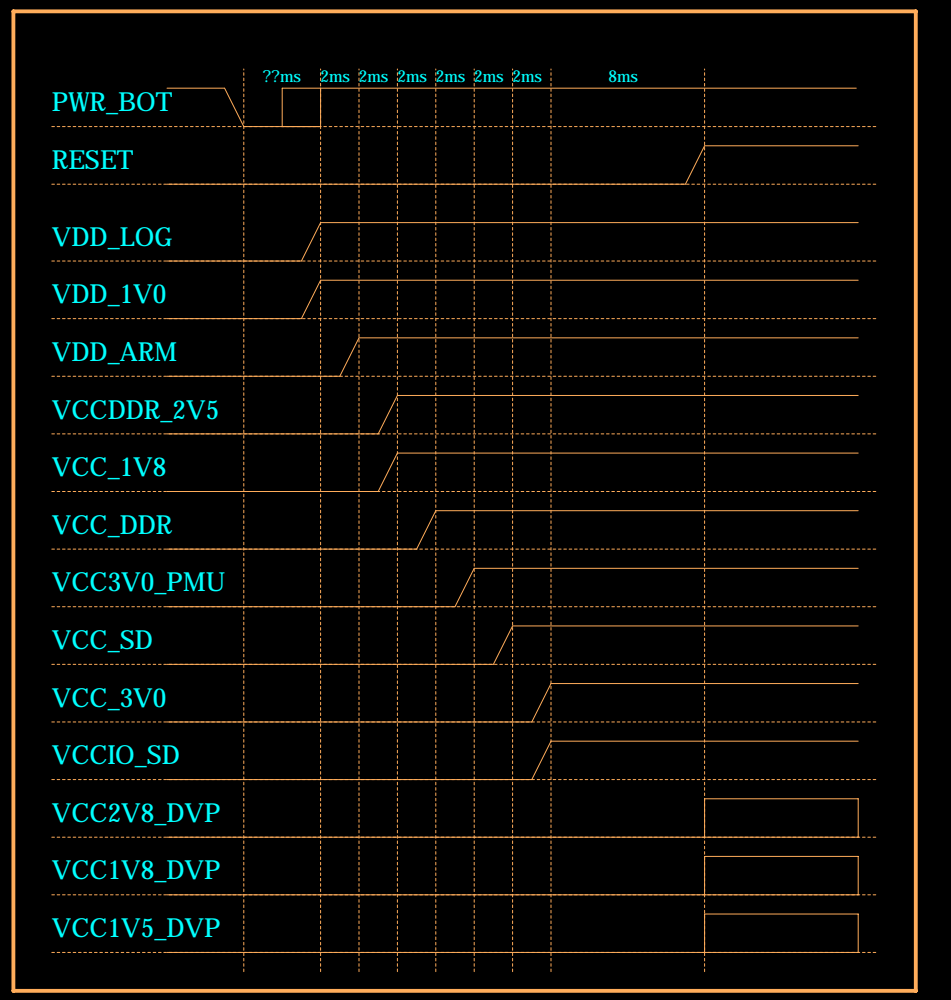
RK817-1 Power Diagram and Sequence

M150F6 Circuit Diagram



RK817-1 Power-on Sequence For RK3326

| PowerName | PMIC Channel | Time Slot (step 2mS) | Default voltage | Supply Limit | Default ON/OFF | Sleep ON/OFF | Peak Current |
|------------|--------------|----------------------|-----------------|--------------|----------------|--------------|--------------|
| VDD_ARM | BUCK1 | Slot:2 | 1.0V | 2.5A | ON | OFF | 1.5A |
| VDD_LOG | BUCK2 | Slot:1 | 1.0V | 2.5A | ON | OFF | 1.4A |
| VCC_DDR | BUCK3 | Slot:4 | FB=0.6V | 1.5A | ON | ON | 1.5A |
| VCC_3V0 | BUCK4 | Slot:7 | 3.0V | 1.5A | ON | ON | 1.5A |
| VCCDDR_2V5 | LDO1 | Slot:3 | 2.5V | 500mA | ON | ON | |
| VCC_1V8 | LDO2 | Slot:3 | 1.8V | 500mA | ON | ON | |
| VDD_1V0 | LDO3 | Slot:1 | 1.0V | 500mA | ON | ON | |
| VCC3V0_PMU | LDO4 | Slot:5 | 3.0V | 100mA | ON | ON | 12mA |
| VCCIO_SD | LDO5 | Slot:7 | 3.0V | 500mA | ON | ON | |
| VCC_SD | LDO6 | Slot:6 | 3.0V | 500mA | ON | ON | 400mA |
| VCC2V8_DVP | LDO7 | | 2.8V | 500mA | OFF | OFF | |
| VCC1V8_DVP | LDO8 | | 1.8V | 500mA | OFF | OFF | |
| VCC1V5_DVP | LDO9 | | 1.5V | 500mA | OFF | OFF | |
| RESET | RESETB | Slot:11 | OD | | | | |



Fuzhou Rockchip Electronics

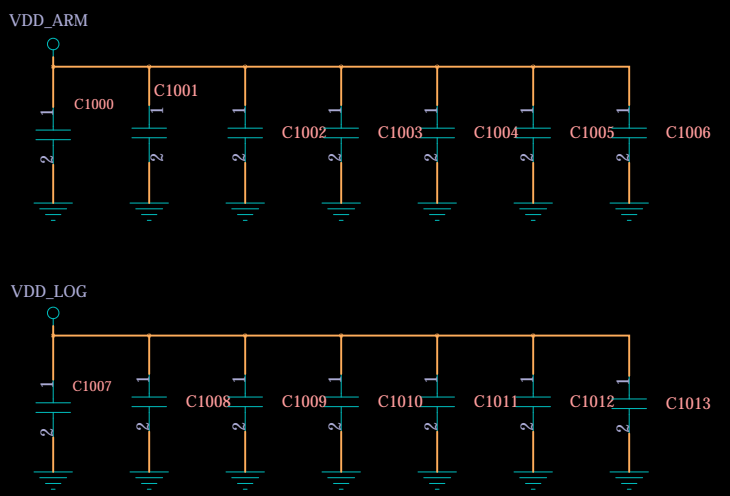
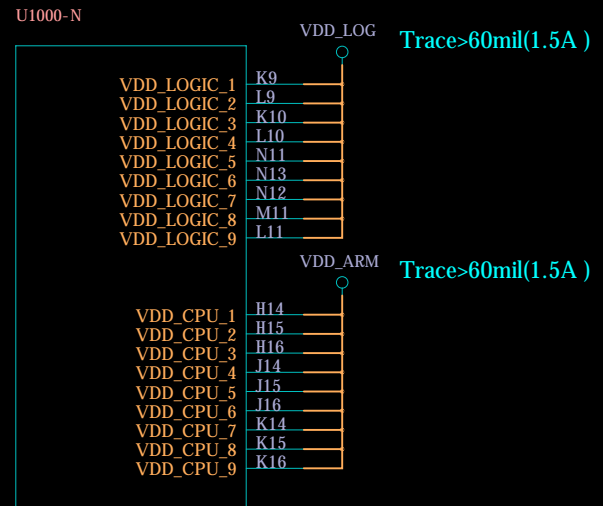
Project: _____

File: _____

Date: Tuesday, March 20, 2018 Rev: V0.1

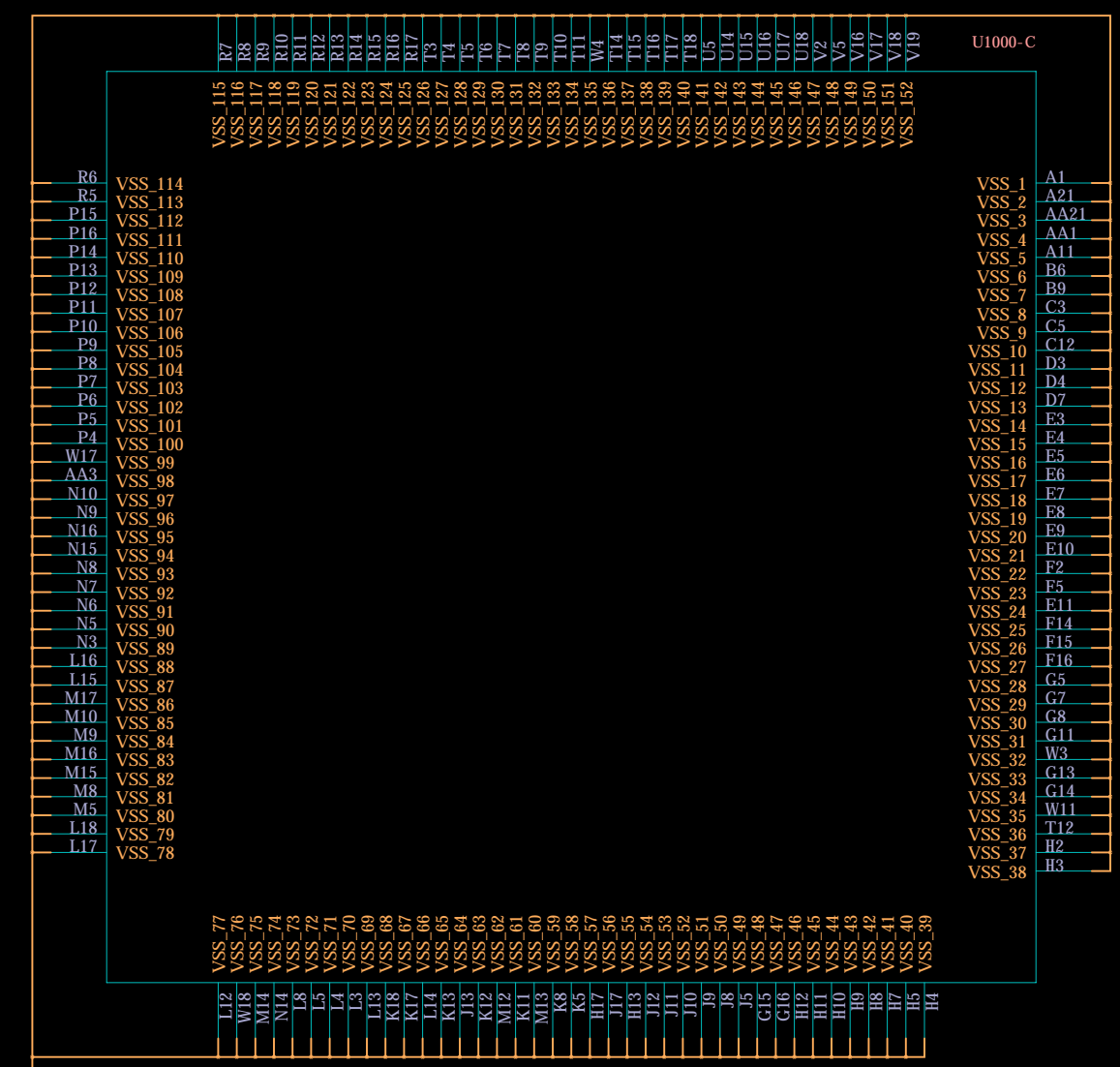
Designed by: Limus Sheet: 11 of 99

RK3326 Part-N

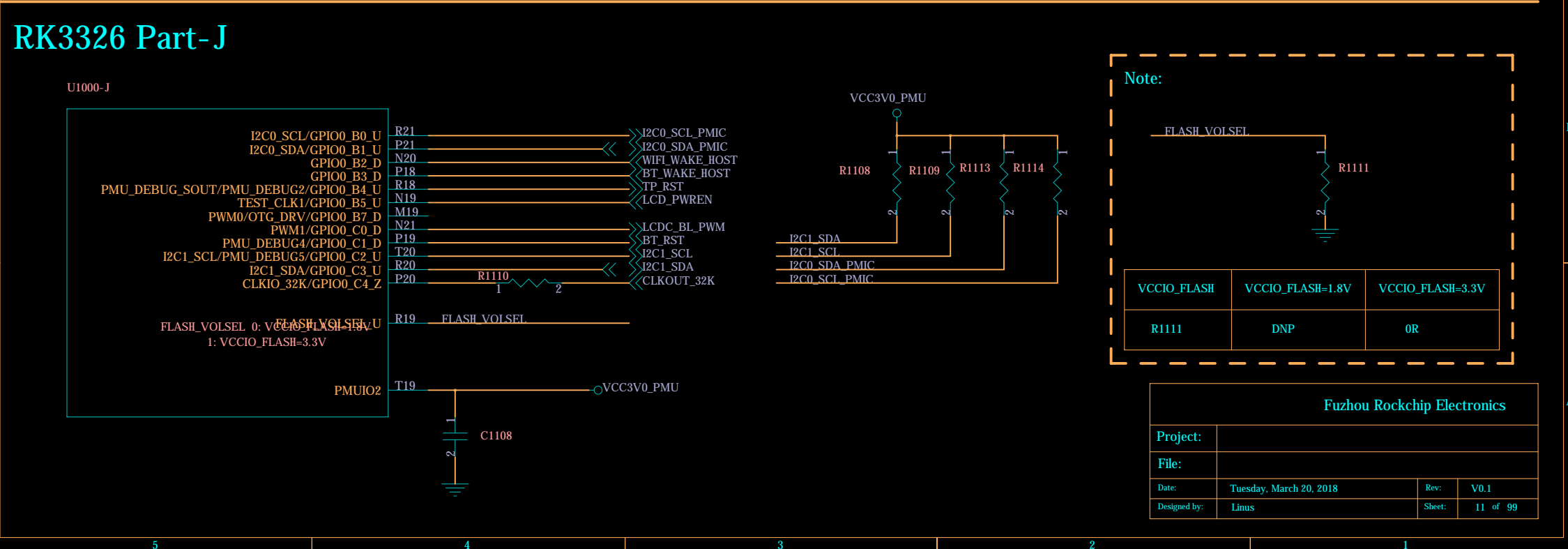
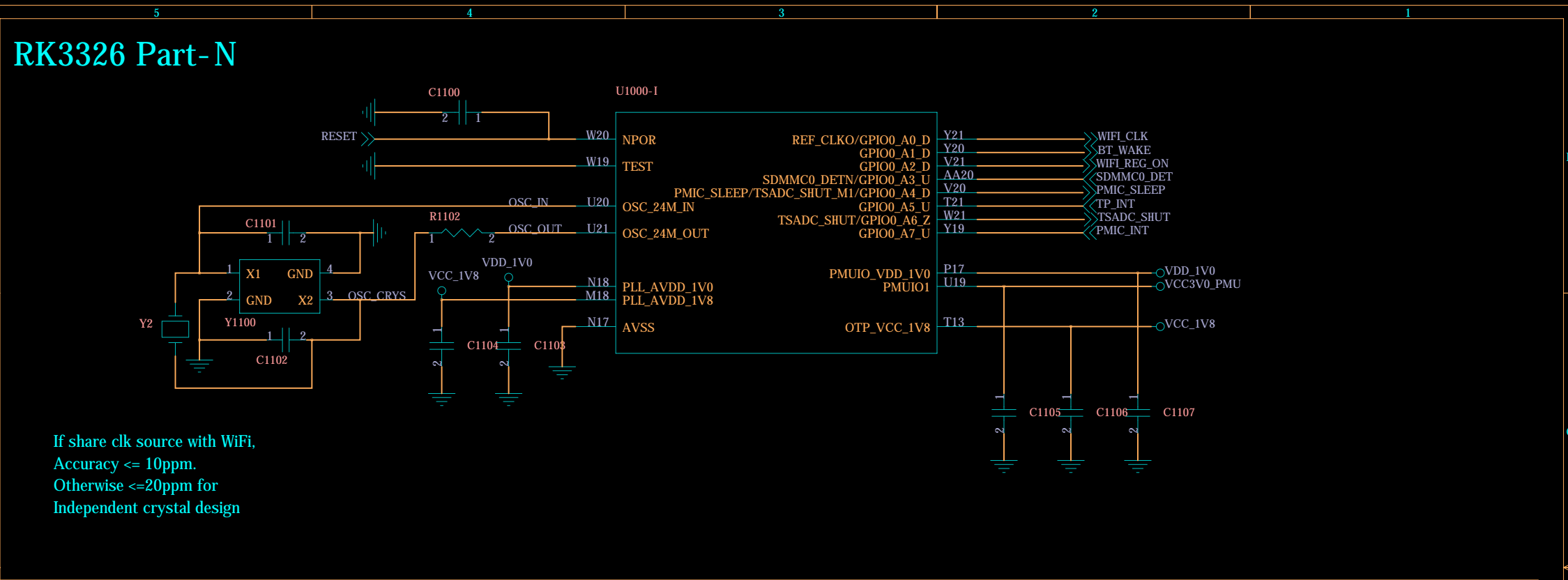


Note: All the Power filter capacitors should be placed close to the power pins of RK3326

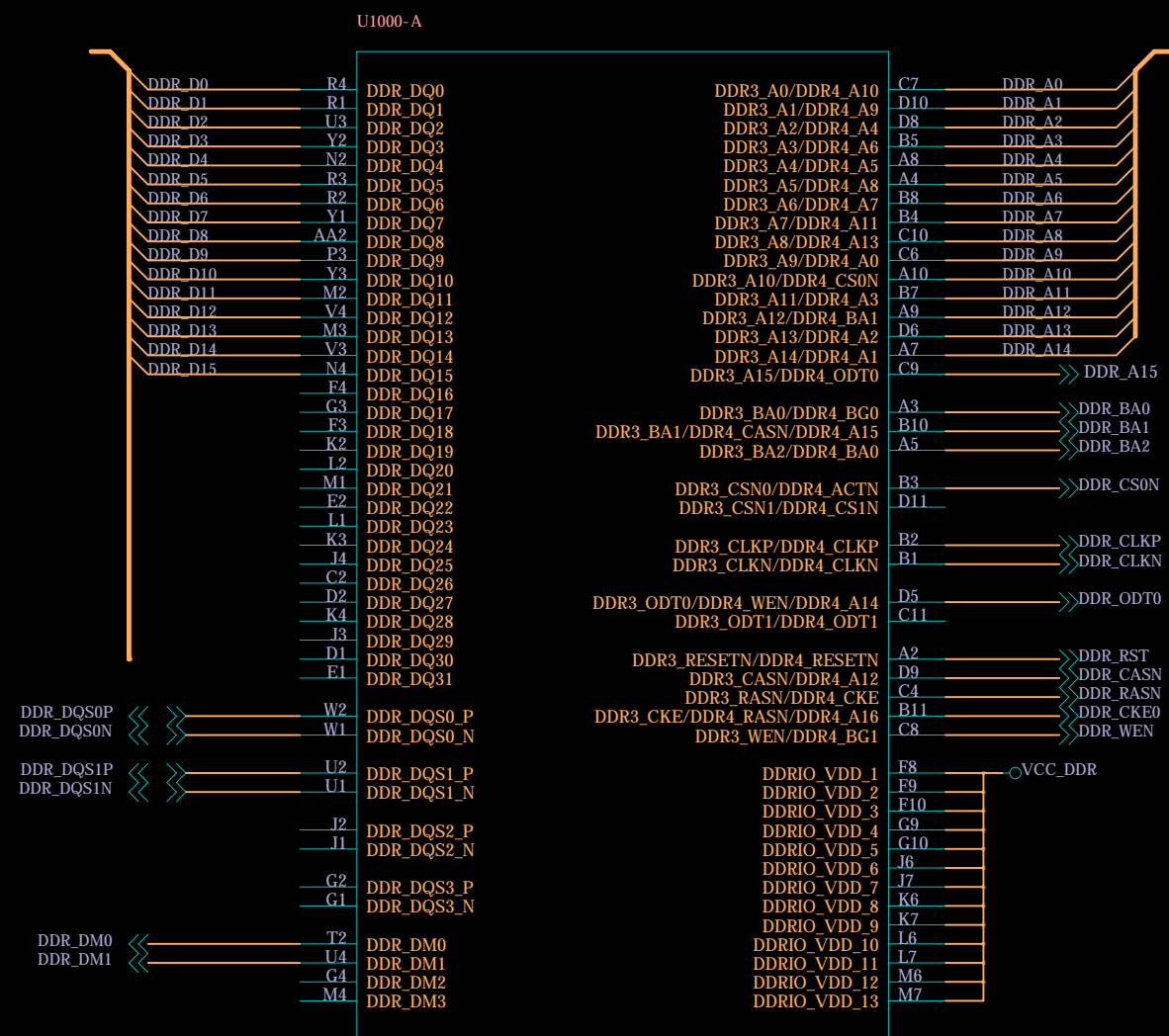
RK3326 Part-C



| | | | |
|-----------------------------|-------------------------|--------|----------|
| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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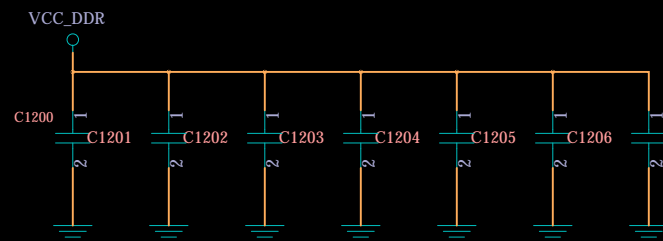
RK3326 Part-A



DDR3/DDR4 PIN MUX

| | |
|-----------|--------------------|
| DDR3_A0 | DDR4_A10 |
| DDR3_A1 | DDR4_A9 |
| DDR3_A2 | DDR4_A4 |
| DDR3_A3 | DDR4_A6 |
| DDR3_A4 | DDR4_A5 |
| DDR3_A5 | DDR4_A8 |
| DDR3_A6 | DDR4_A7 |
| DDR3_A7 | DDR4_A11 |
| DDR3_A8 | DDR4_A13 |
| DDR3_A9 | DDR4_A0 |
| DDR3_A10 | DDR4_CS0n |
| DDR3_A11 | DDR4_A3 |
| DDR3_A12 | DDR4_BA1 |
| DDR3_A13 | DDR4_A2 |
| DDR3_A14 | DDR4_A1 |
| DDR3_A15 | DDR4_ODT0 |
| DDR3_BA0 | DDR4_BG0 |
| DDR3_BA1 | DDR4_CASn/DDR4_A15 |
| DDR3_BA2 | DDR4_BA0 |
| DDR3_CS0n | DDR4_ACTn |
| DDR3_CS1n | DDR4_CS1n |
| DDR3_ODT0 | DDR4_WEn/DDR4_A14 |
| DDR3_ODT1 | DDR4_ODT1 |
| DDR3_CLKP | DDR4_CLKP |
| DDR3_CLKn | DDR4_CLKn |
| DDR3_CKE | DDR4_RASn/DDR4_A16 |
| DDR3_RASn | DDR4_CKE |
| DDR3_CASn | DDR4_A12 |
| DDR3_WEn | DDR4_BG1 |
| DDR3_RST | DDR4_RST |

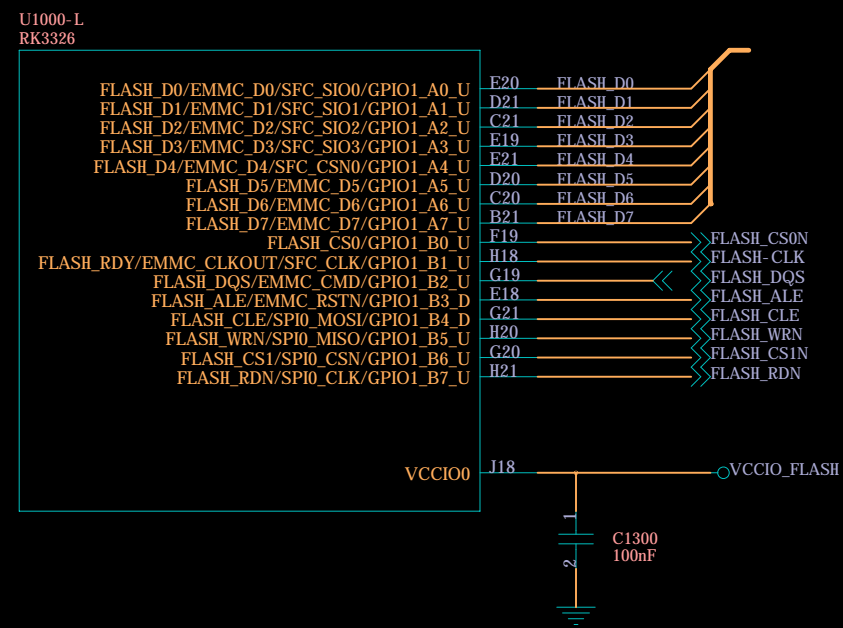
Power Filter



Note: All the Power filter capacitors should be placed close to the power pins of RK3326

| | | | |
|-----------------------------|-------------------------|--------|----------|
| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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RK3326 Part-L

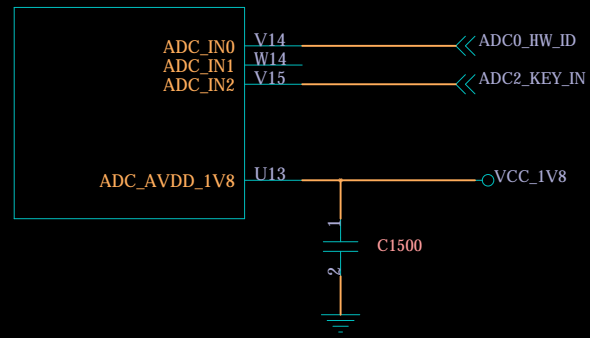


Fuzhou Rockchip Electronics

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| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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RK3326 Part-F

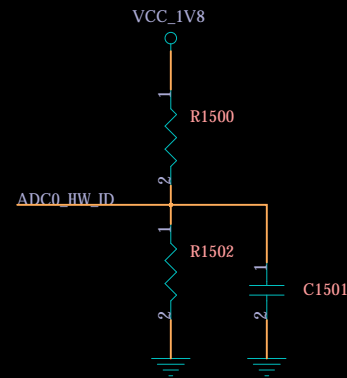
U1000-F



| Key Name | SARADC |
|---------------|--------|
| VOL+/RECOVERY | 10 |
| VOL- | 170 |

HW ID

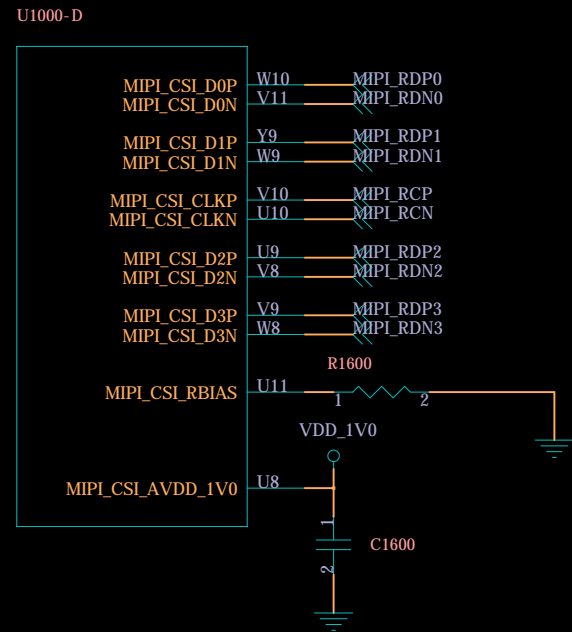
| ADC0_HW_ID | Pull-up Resistance | Pull-down Resistance | ADC Value |
|---------------|--------------------|----------------------|-----------|
| BOM0(Default) | 51K | DNP | 1024 |
| BOM1 | DNP | 51K | 0 |
| BOM2 | 51K | 51K | 512 |
| BOM3 | 100K | 51K | 346 |
| BOM4 | 51K | 100K | 678 |



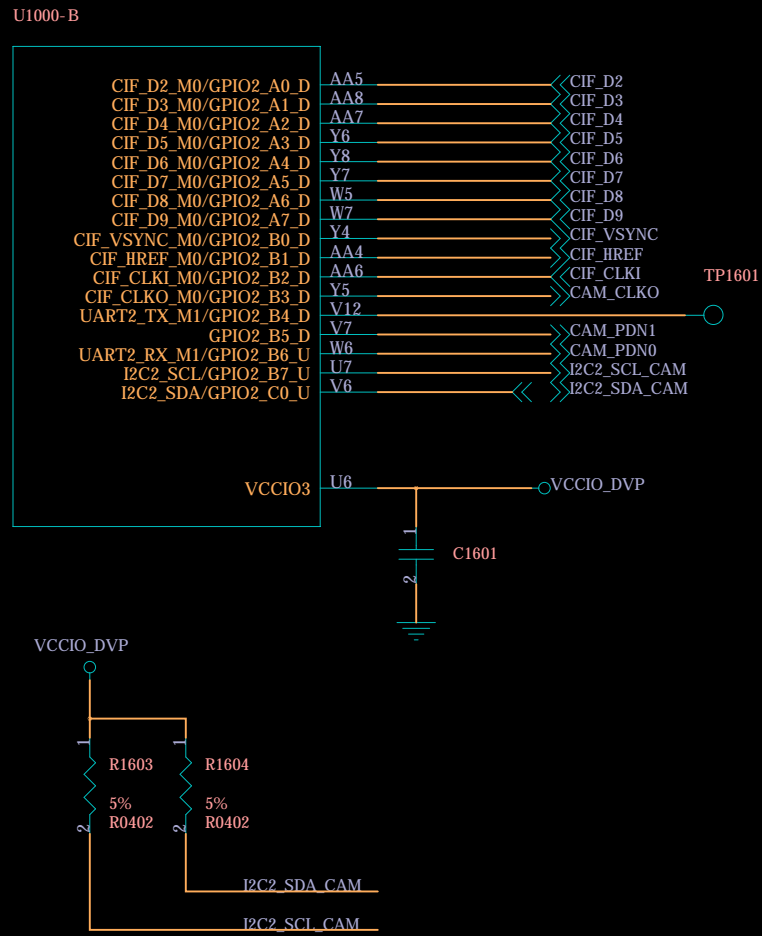
Fuzhou Rockchip Electronics

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| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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RK3326 Part-D

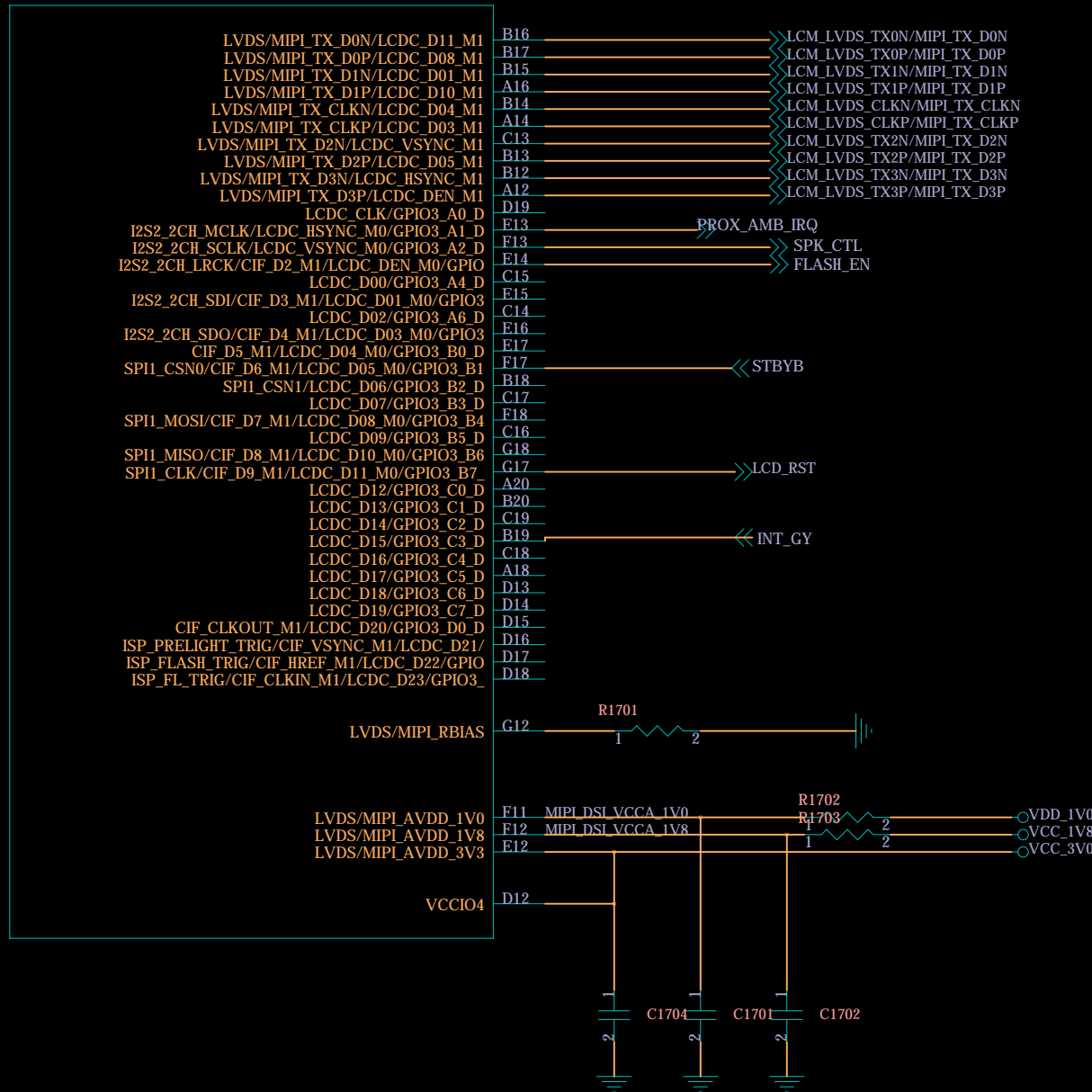


RK3326 Part-B

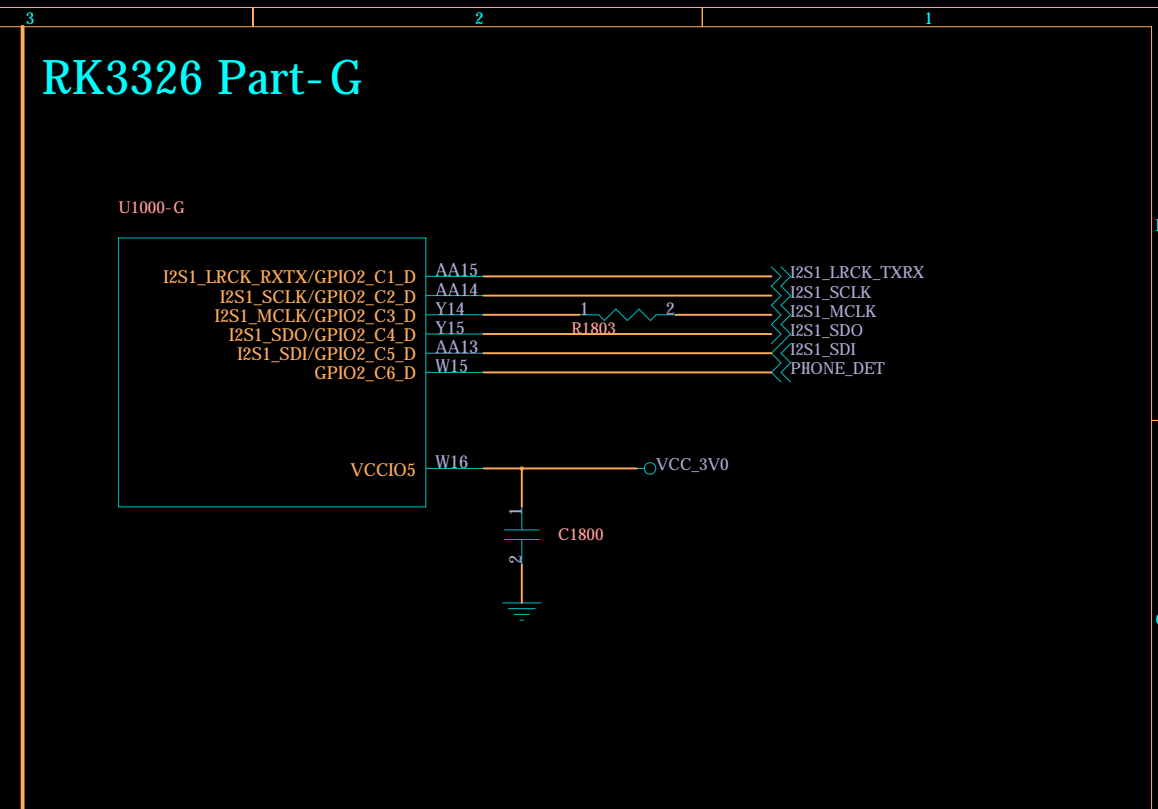
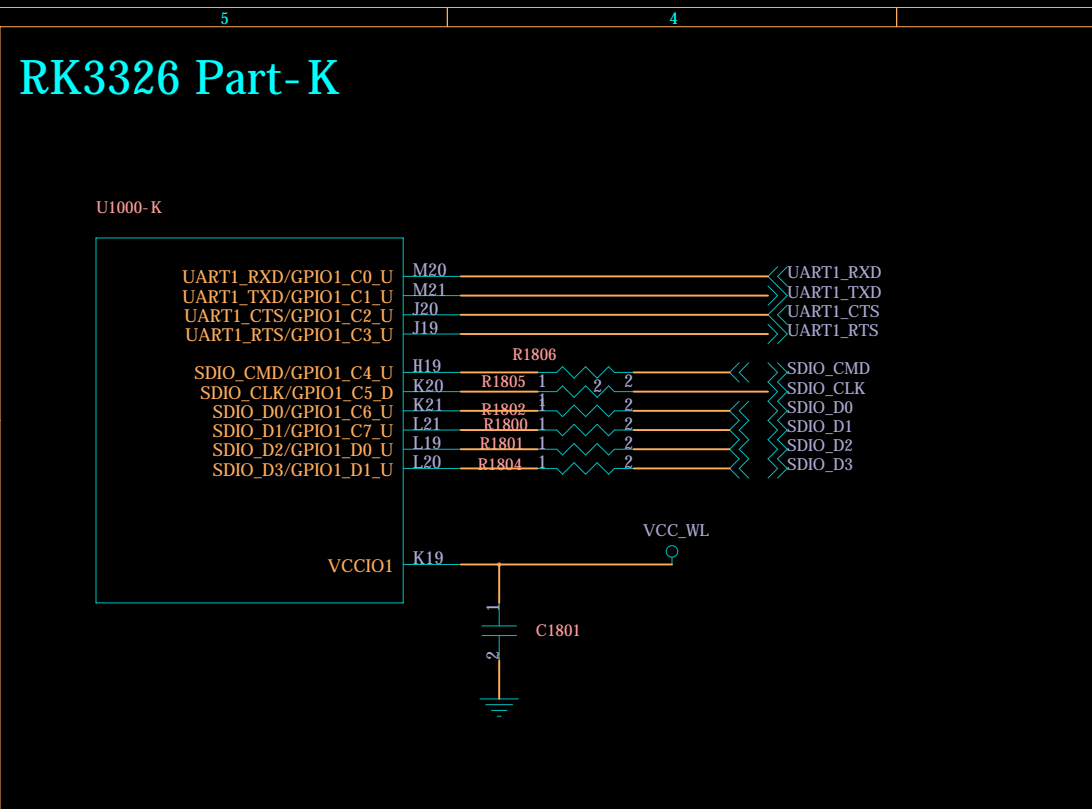


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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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U1000-M

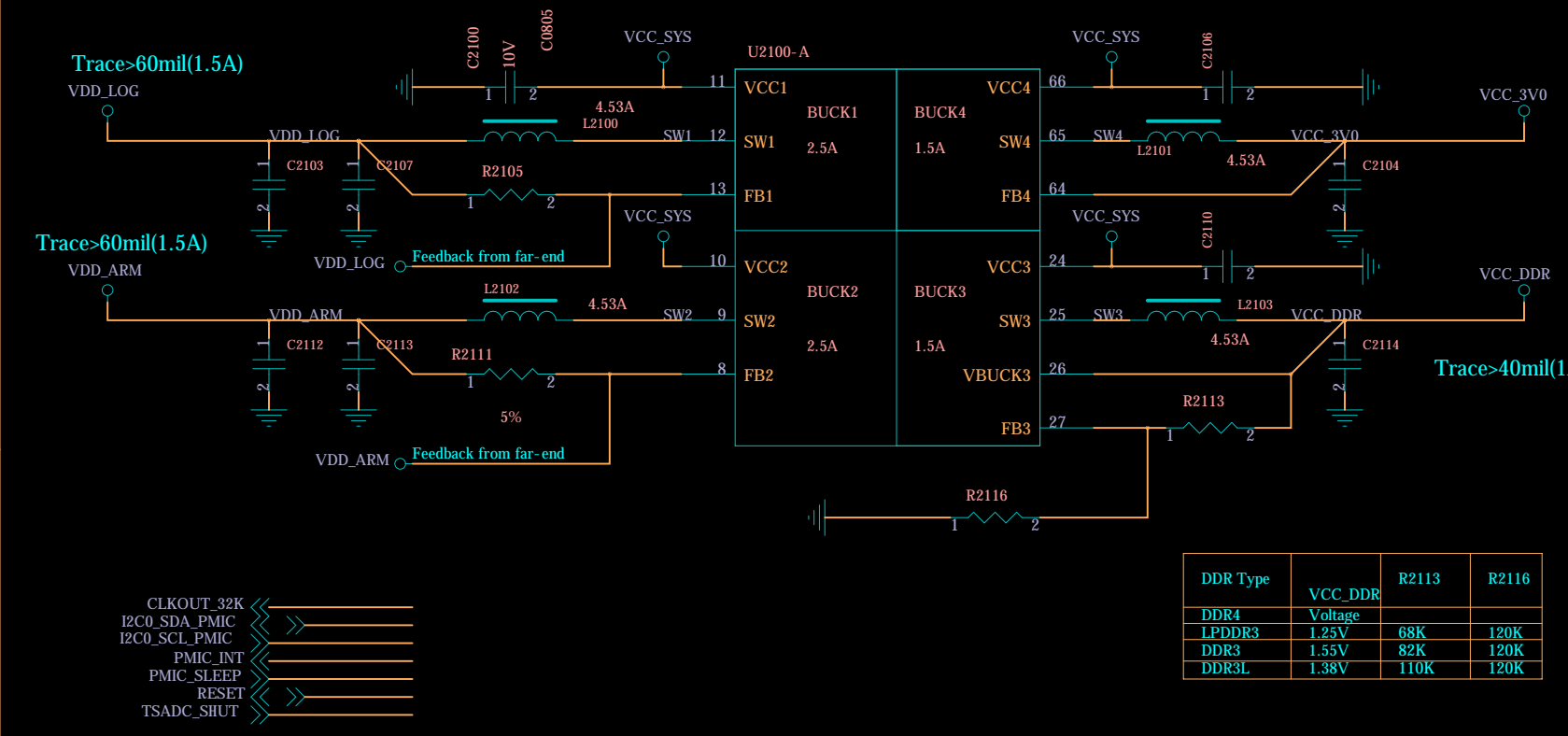


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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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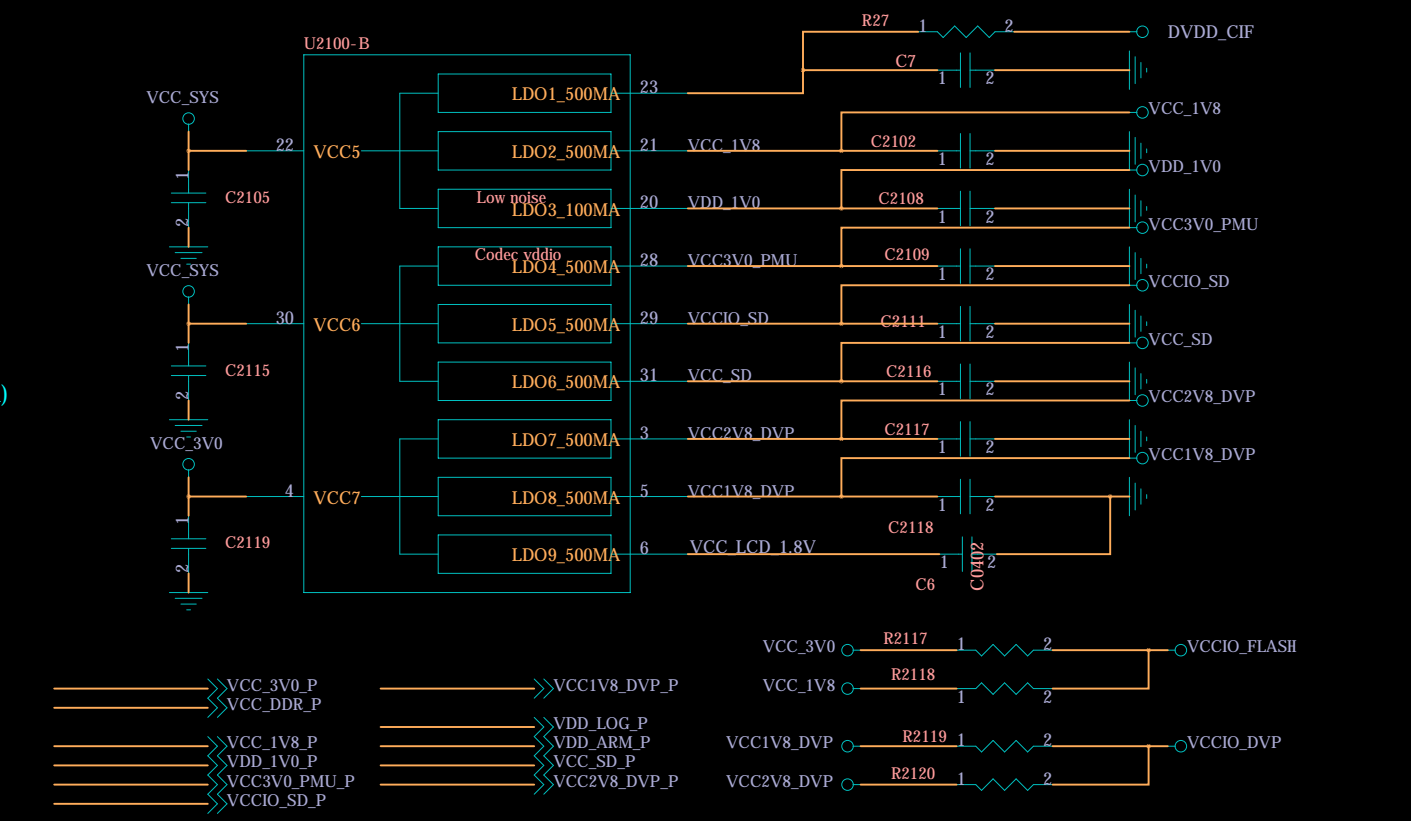


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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
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| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |

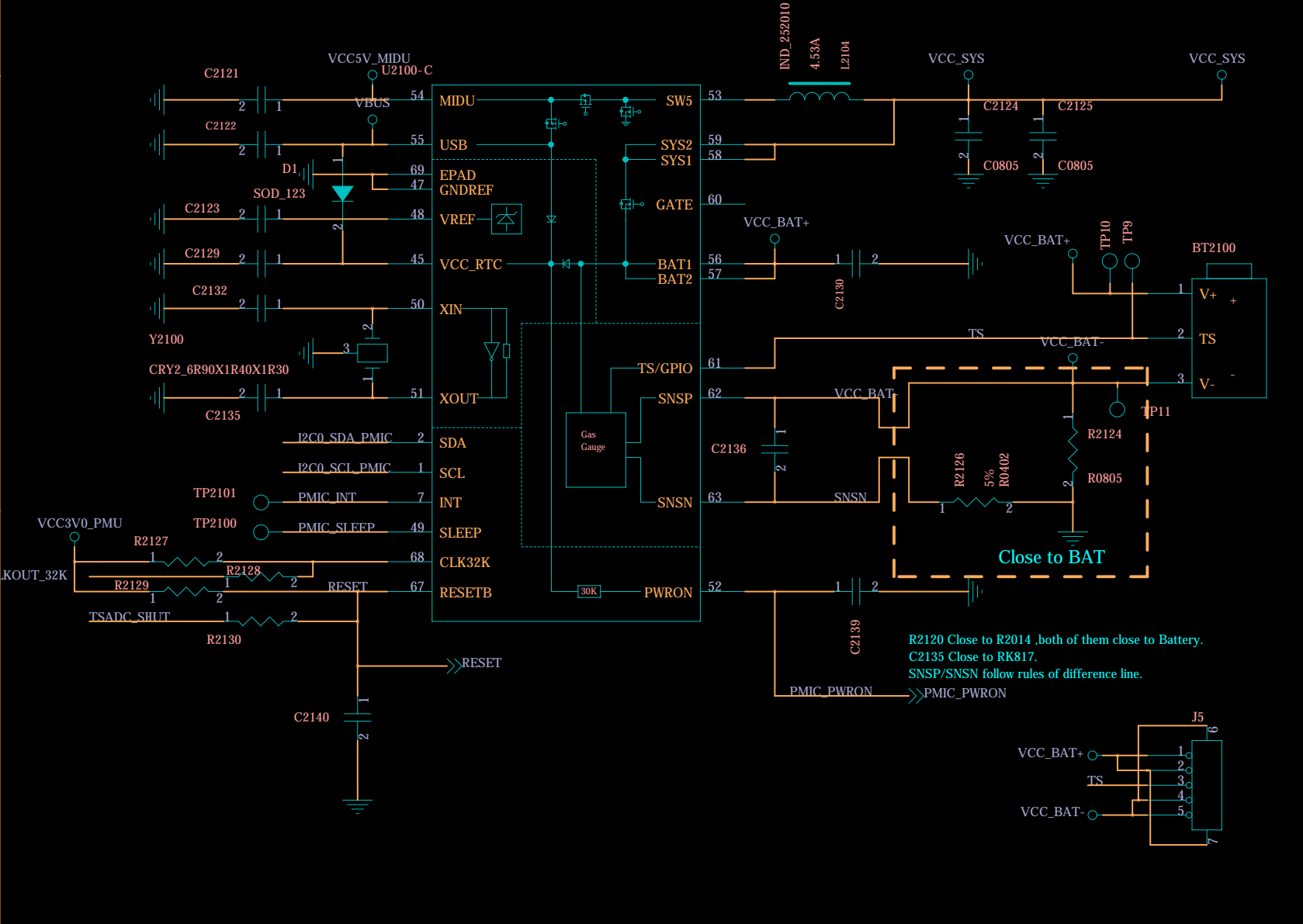
PMIC RK817-1 DCDC



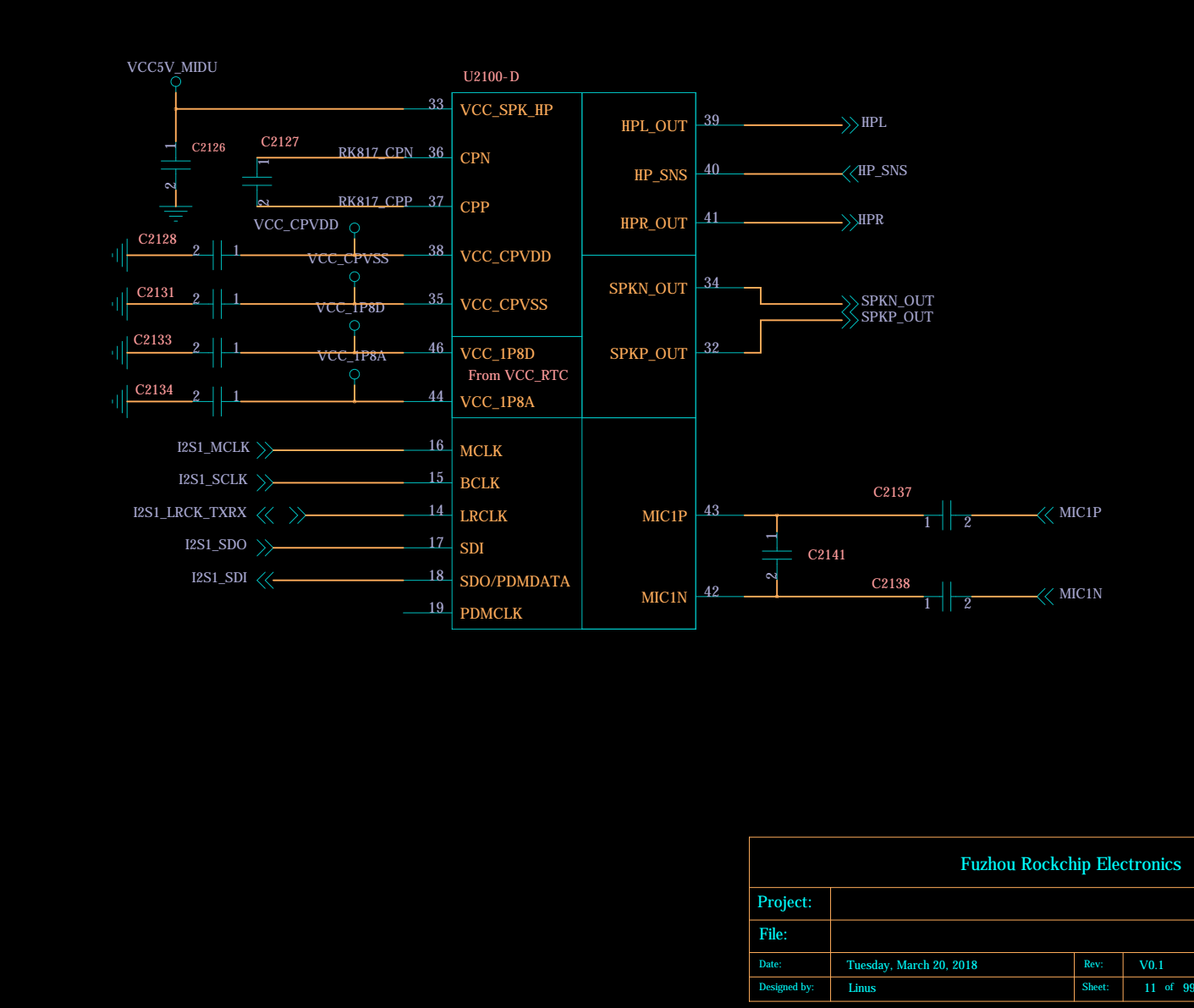
PMIC RK817-1 LDO



PMIC RK817-1 Management



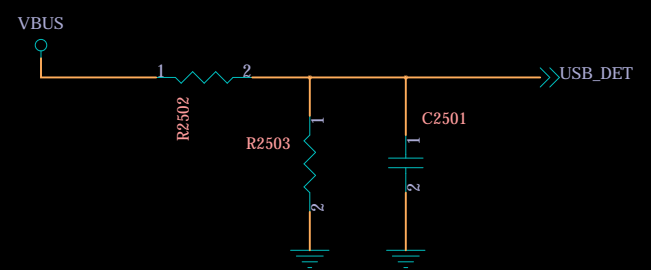
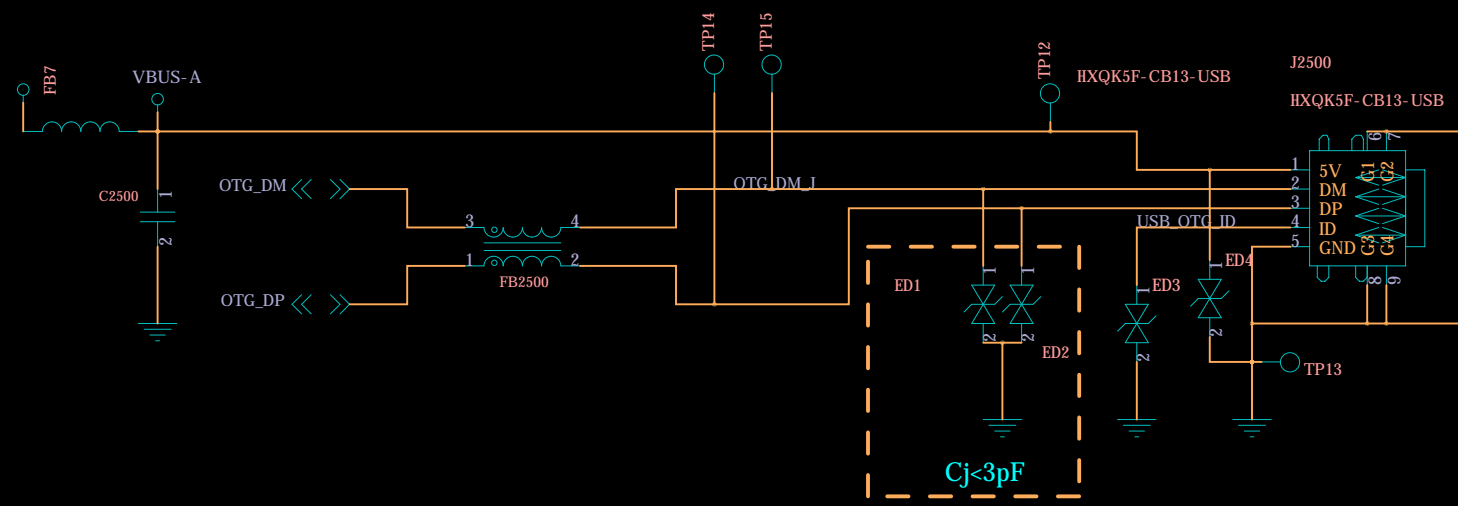
PMIC RK817-1 CODEC



| | | | |
|-----------------------------|-------------------------|--------|----------|
| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |

USB Port

USB_OTG_ID >>



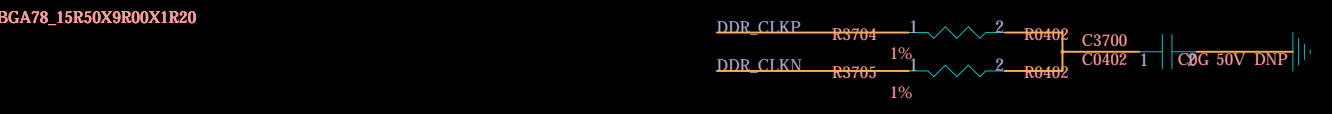
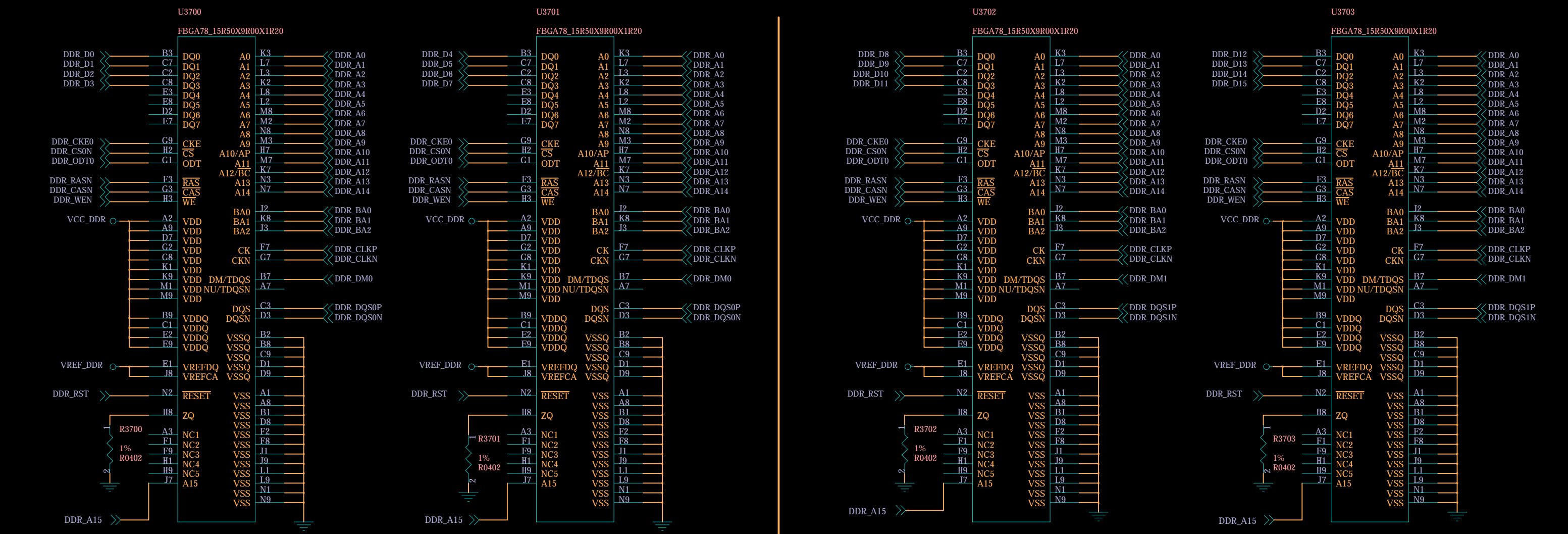
Fuzhou Rockchip Electronics

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|--------------|-------------------------|--------|----------|
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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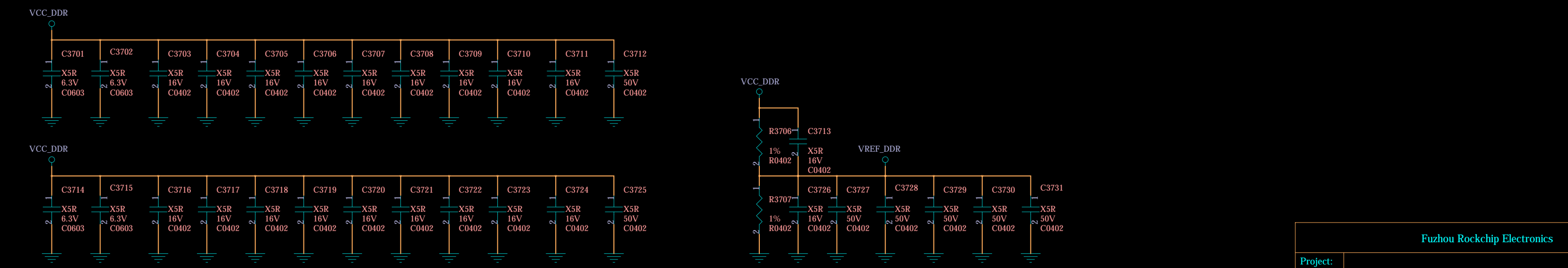
DDR3 4x4bit

Note: The simulation frequency of the template is 456MHz.
Remind: Refer to the latest AVL for parts selection.

4X4bit DDR3



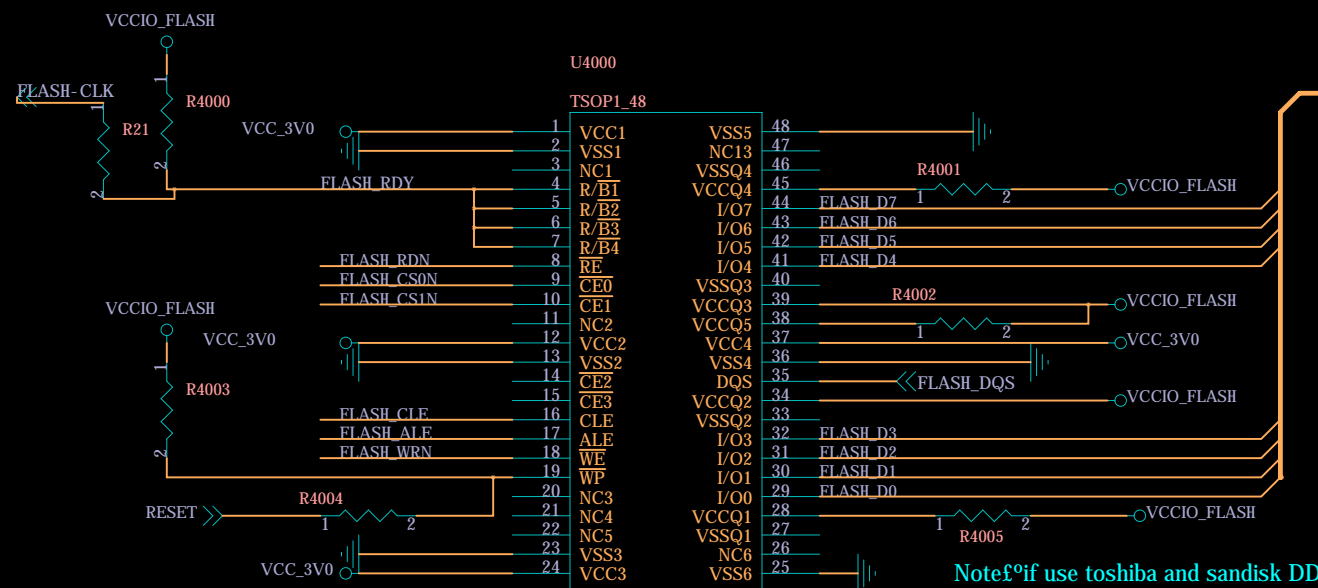
DDR3 FILTER



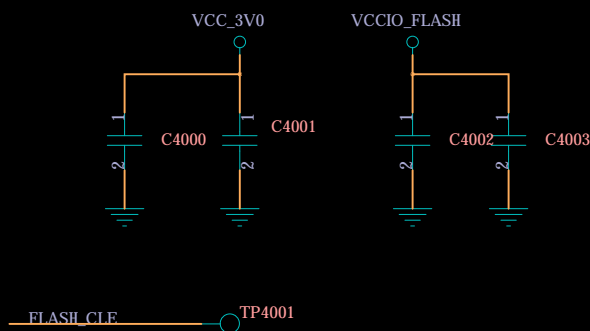
| | | | |
|------------------------------------|-------------------------|--------|----------|
| Fuzhou Rockchip Electronics | | | |
| Project: | RAM DDR3 4x4bit | | |
| File: | RAM DDR3 4x4bit | | |
| Date: | Friday, August 24, 2018 | Rev: | V1.0 |
| Designed by: | Zhangdz | Sheet: | 11 of 99 |

Nand Flash

Remind: Refer to the latest AVL for parts selection.



Notef*if use toshiba and sandisk DDR mode, VCCQ1 and VCCQ4 must be connected to VCC_IO;f

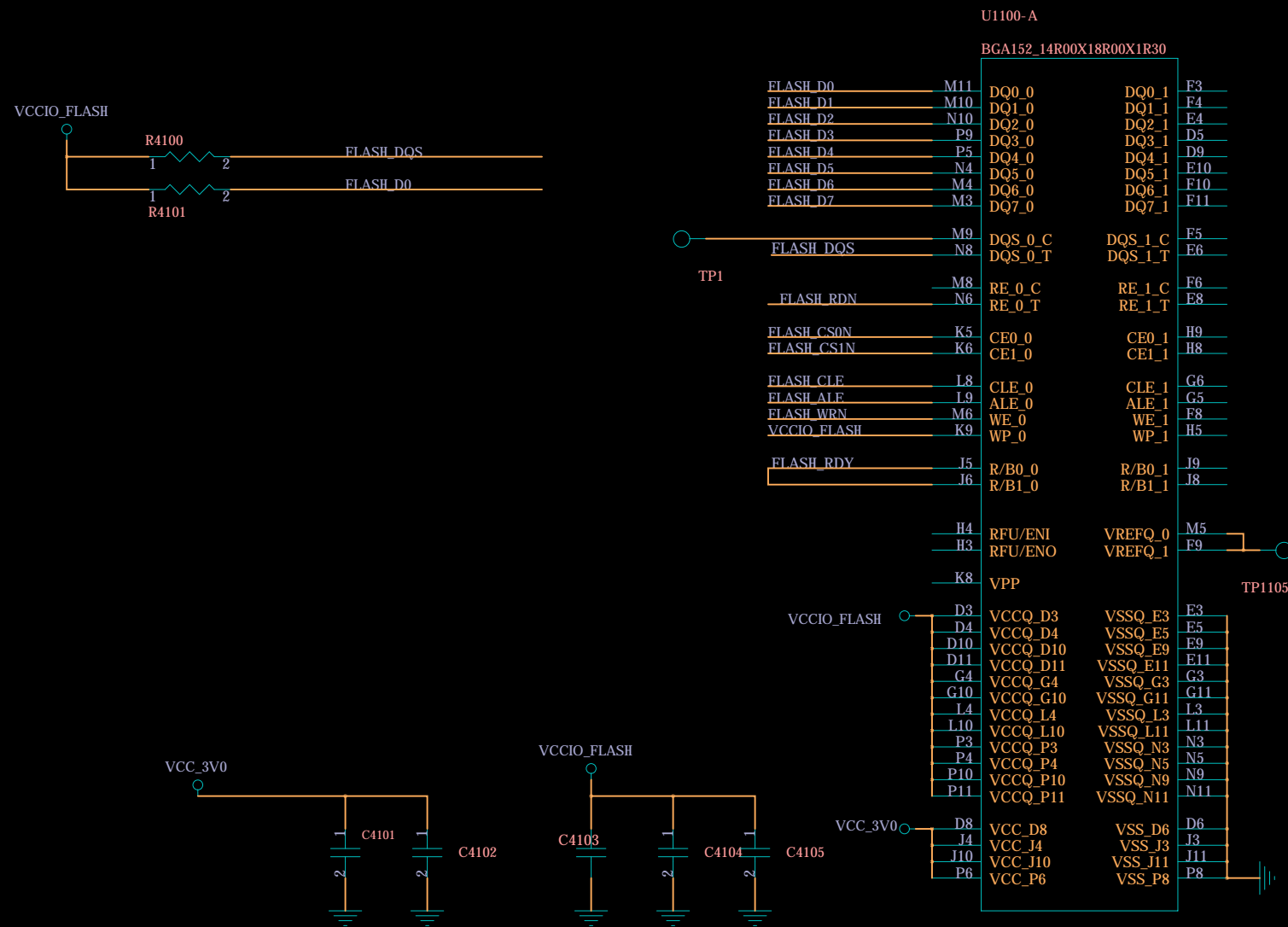


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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |

BGA Flash

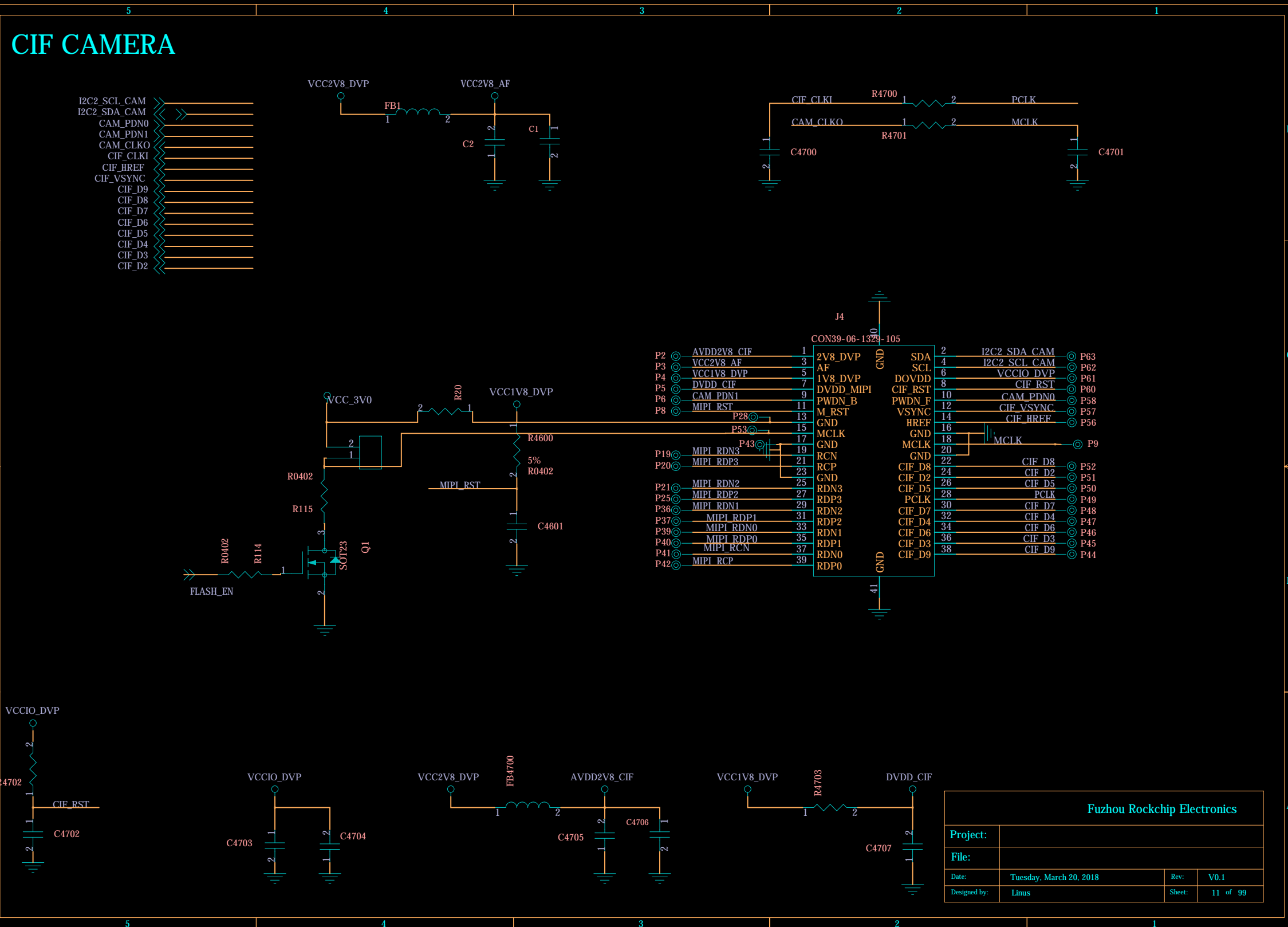
Remind: Refer to the latest AVL for parts selection.

FLASH_RDY
FLASH_ALE/EMMC_RST
FLASH_DQS

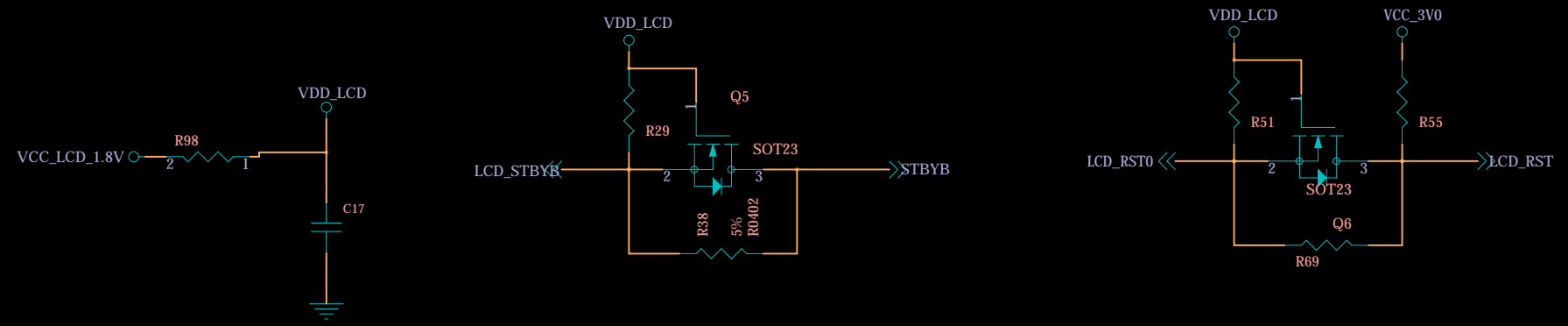


Note:
Reserve TestPoint for firmware update.
If FLASH_CLE=0V at power-on reset,
then system will enter into Maskrom mode.

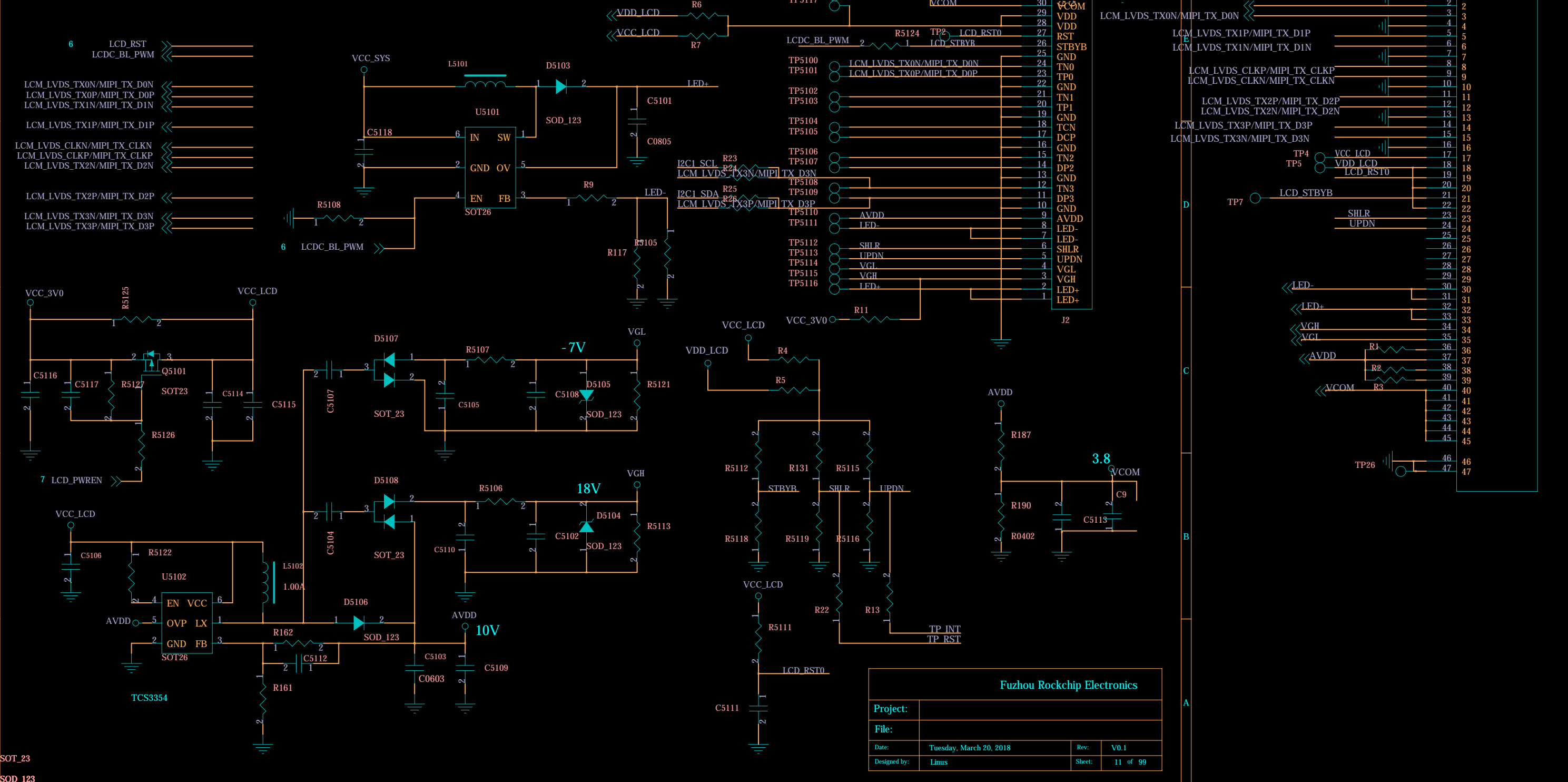
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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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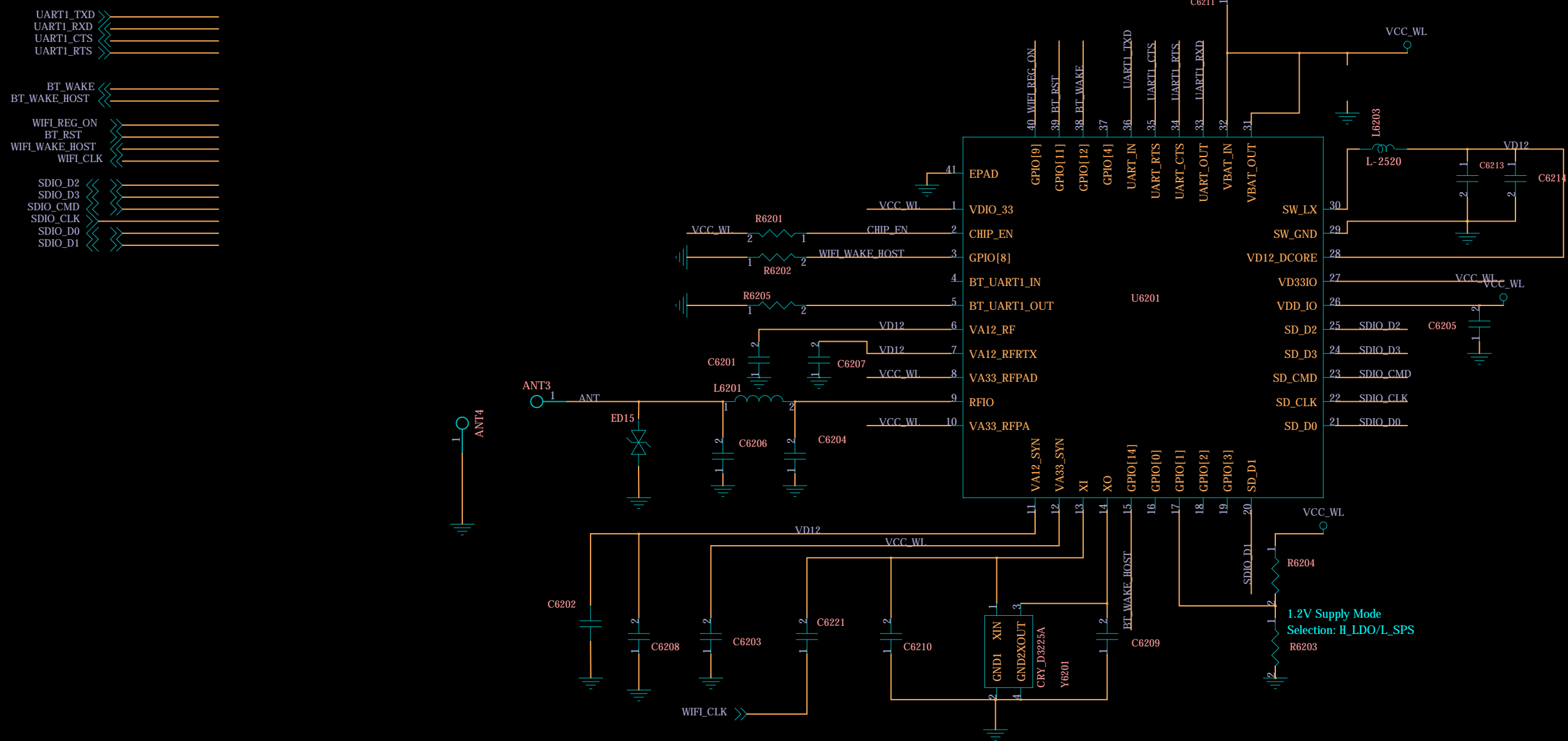
LCM MIPI Connector



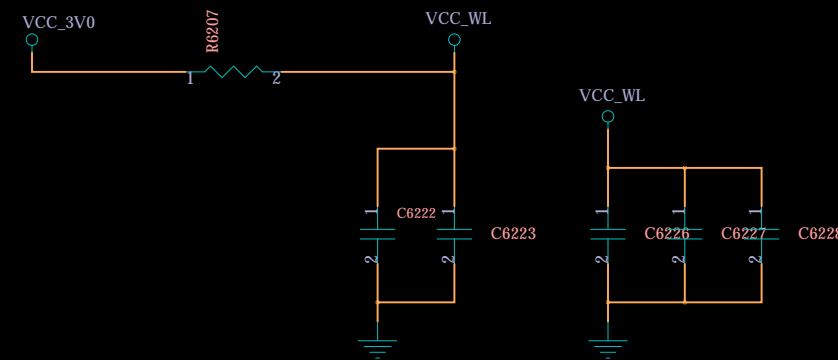
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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |

SOT_23
SOD_123

WiFi/BT Module

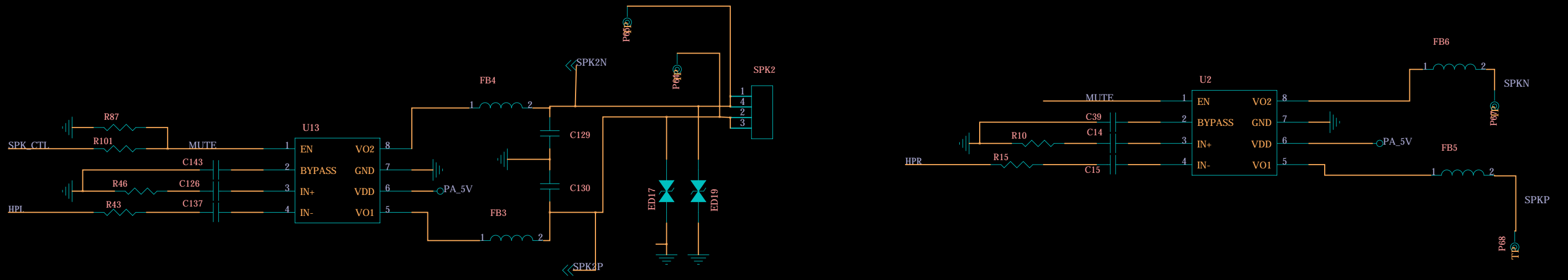


Module Power

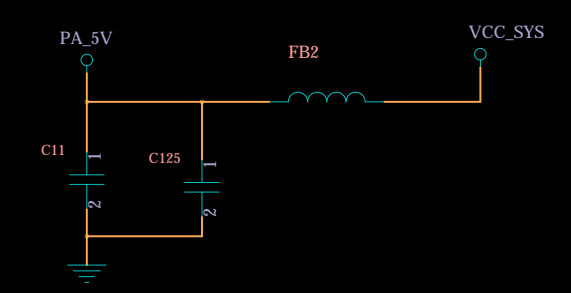
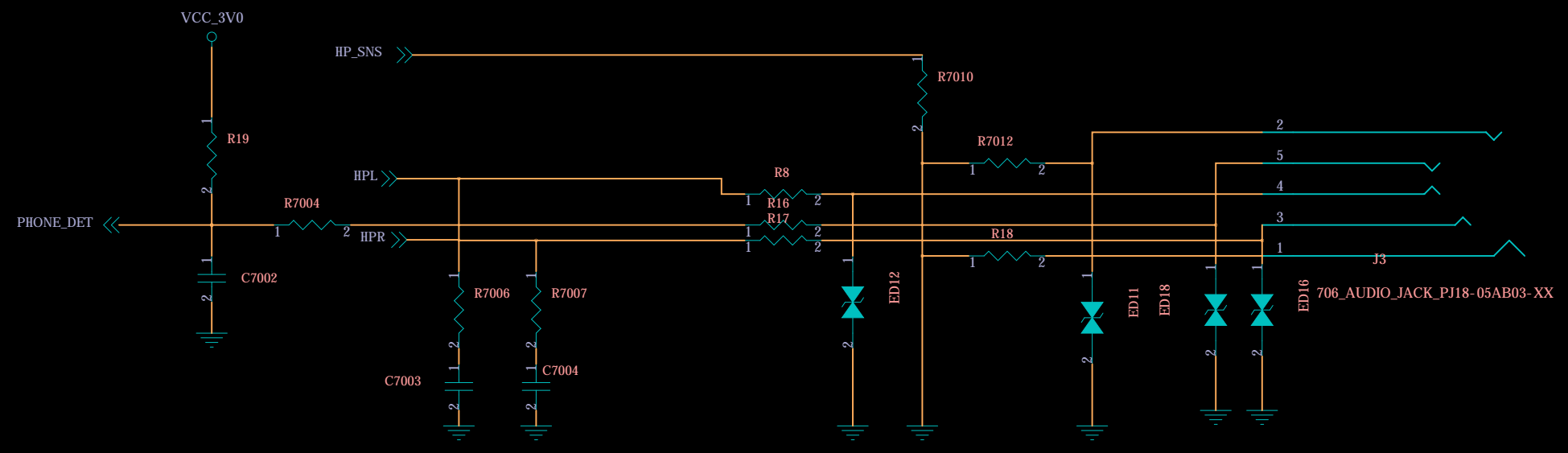


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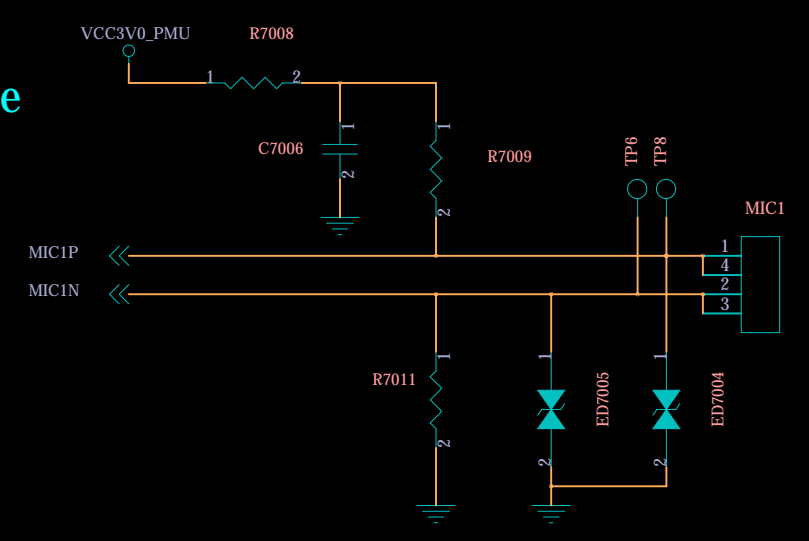
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| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |



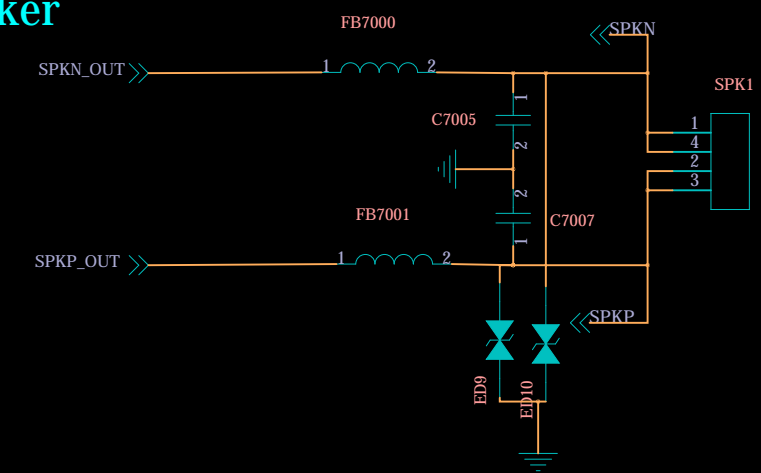
Headphone



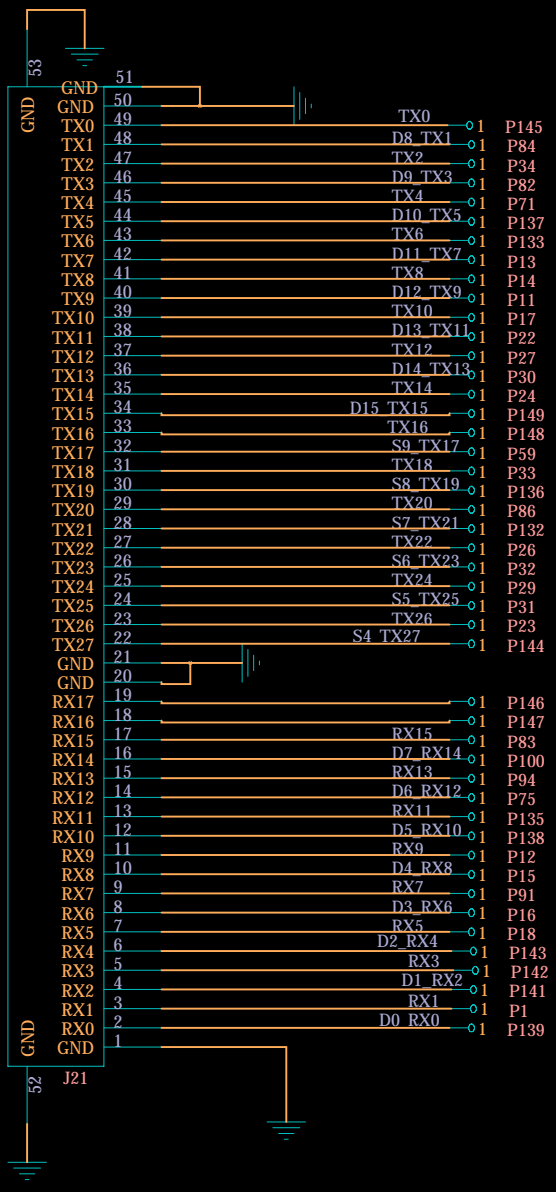
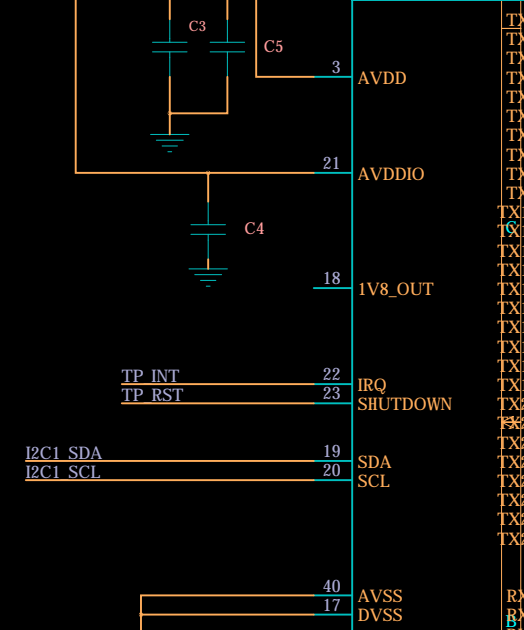
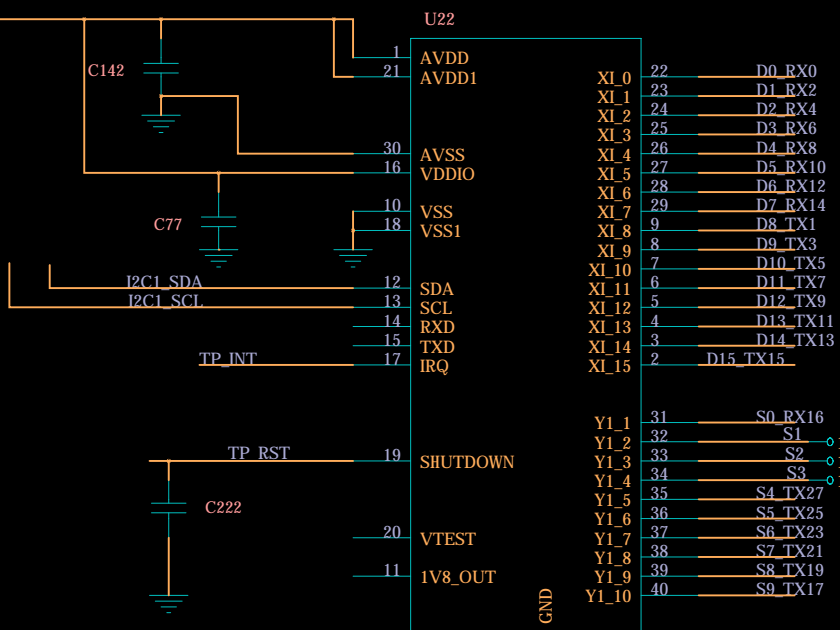
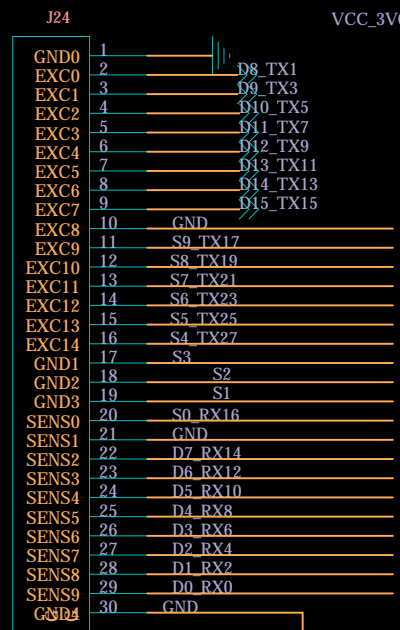
Microphone



Speaker



| | | | |
|-----------------------------|-------------------------|--------|----------|
| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |



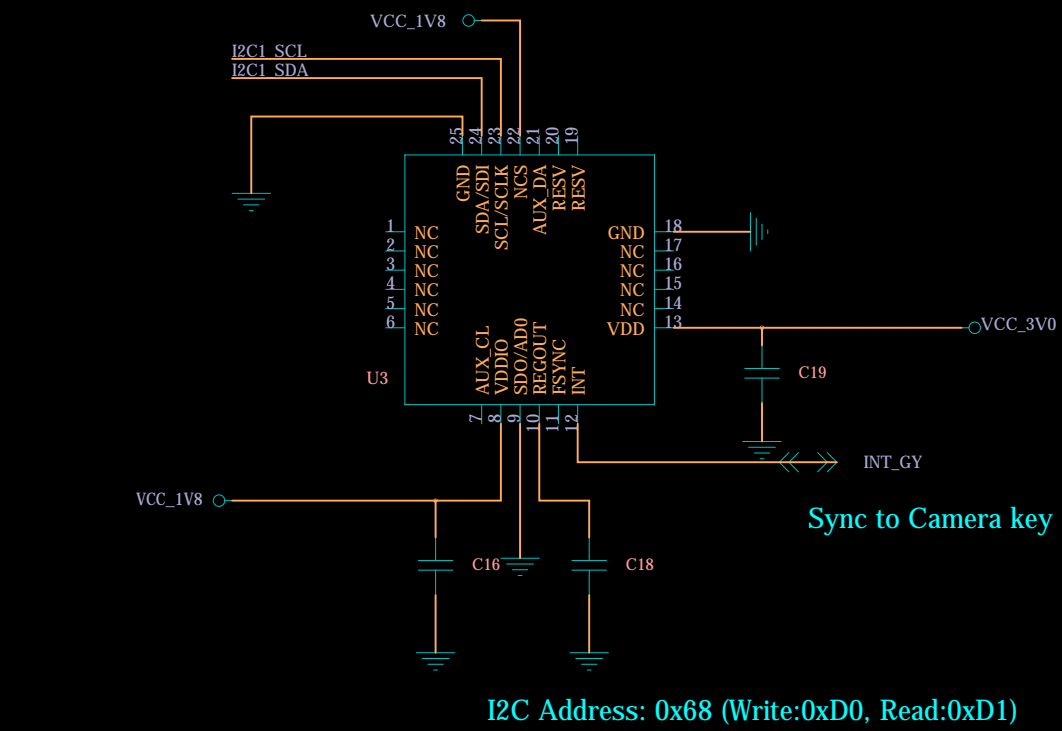
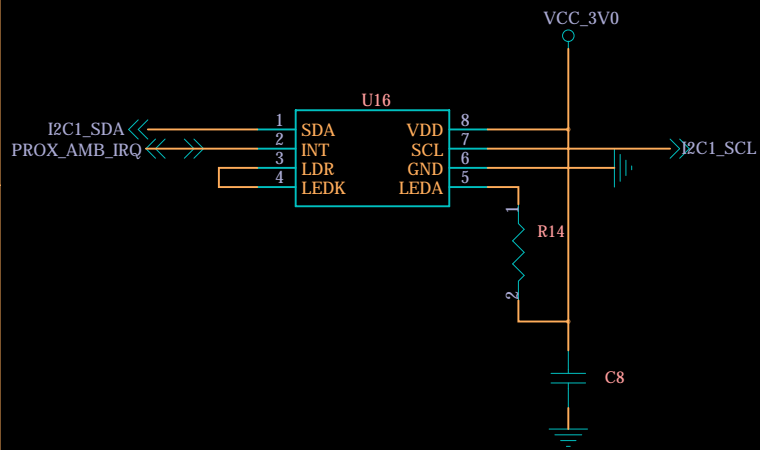
Fuzhou Rockchip Electronics
GSL3675

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| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |

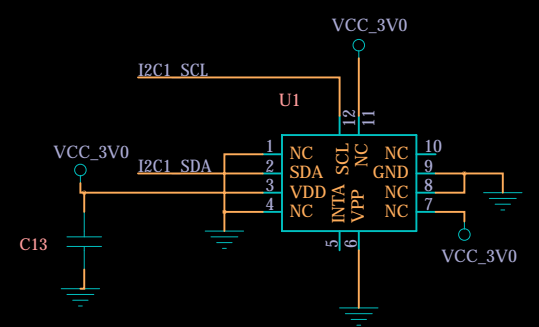
G-sensor

I2C1_SDA
I2C1_SCL
SENSOR_INT

| | LIS3DH(A-EI) | MMA8452Q | LSM303D |
|-------|--------------|----------|---------|
| C9001 | NC | NC | 4.7uF |
| R9002 | 0ohm | NC | NC |
| R9001 | NC | 0ohm | NC |
| C9003 | NC | 0.1uF | 0.22uF |
| R9003 | NC | NC | 0R |

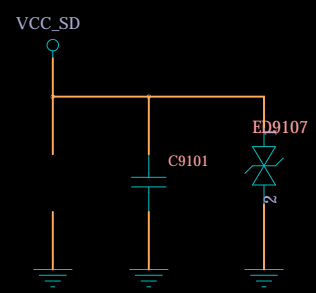
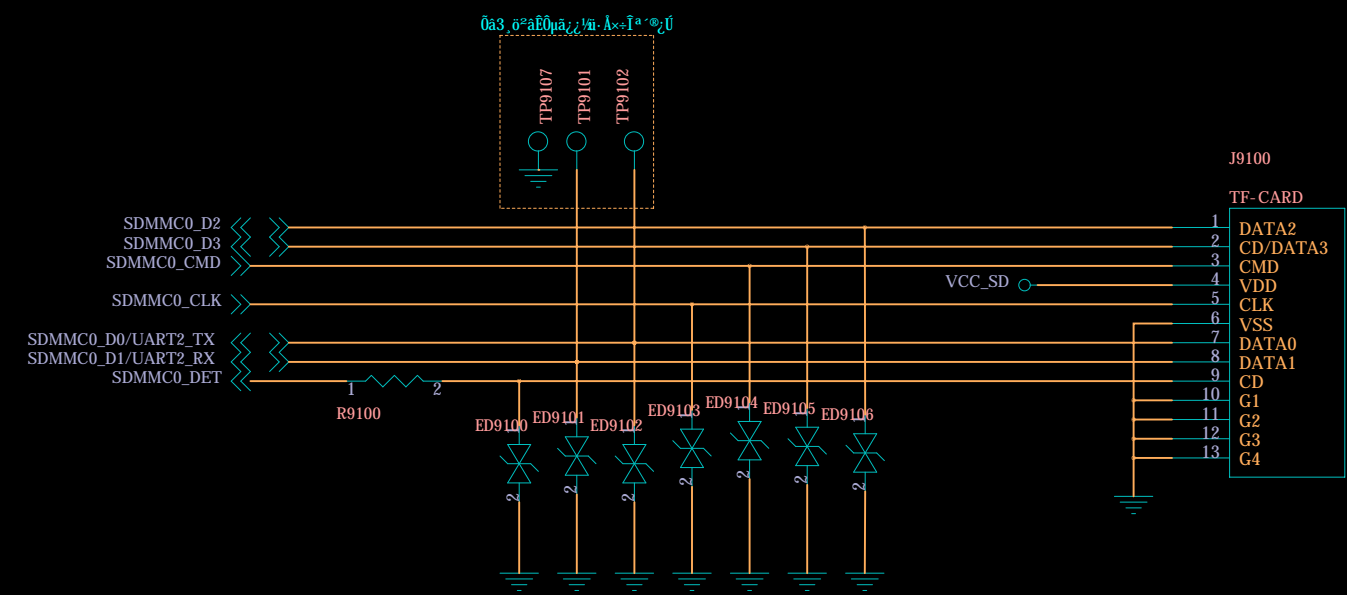


I2C Address: 0x68 (Write:0xD0, Read:0xD1)



| Fuzhou Rockchip Electronics | | | |
|-----------------------------|-------------------------|--------|----------|
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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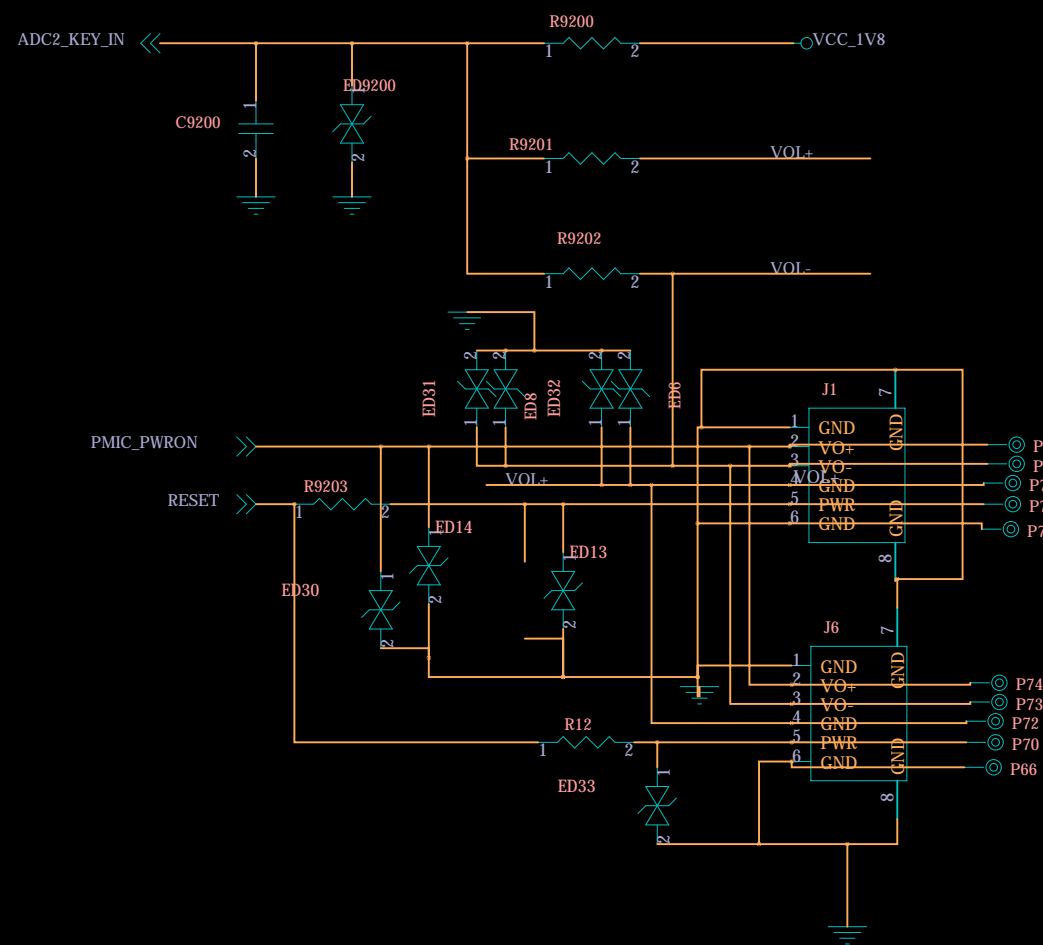
TF Card



Close to TF Connector

| | | | |
|-----------------------------|-------------------------|--------|----------|
| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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KEY BAORD



| Key Name | SARADC |
|---------------|--------|
| VOL+/RECOVERY | 10 |
| VOL- | 170 |

| Fuzhou Rockchip Electronics | | | |
|-----------------------------|-------------------------|--------|----------|
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
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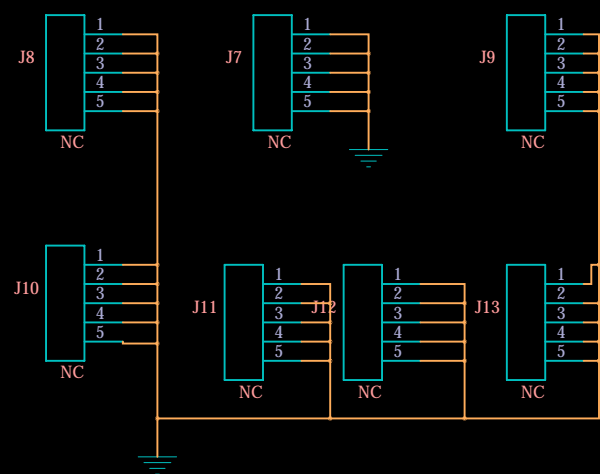
5 4 3 2 1

D

C

B

A



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| Fuzhou Rockchip Electronics | | | |
| Project: | | | |
| File: | | | |
| Date: | Tuesday, March 20, 2018 | Rev: | V0.1 |
| Designed by: | Linus | Sheet: | 11 of 99 |

5 4 3 2 1