

SUPER_SMCB_V11

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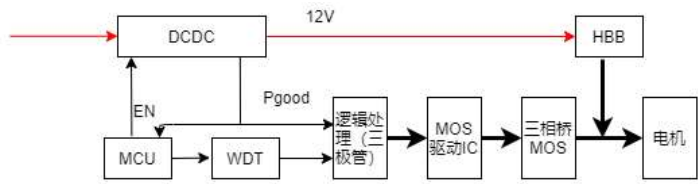
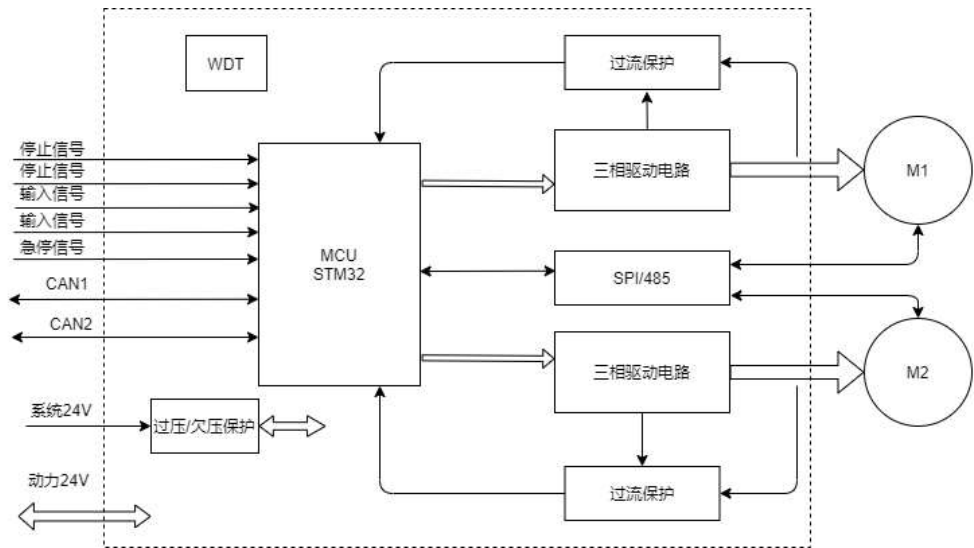
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|-----------|----------------|---------------------------------------|----------|
| Syrius 炬星 | | Syriusrobotics Technologies(ShenZhen) | |
| Title: | SUPER_SMCB_V11 | Document Number: <XXXXX> | |
| Date: | 2024-08-30 | VER: V11 | SIZE: A3 |
| Author: | LIANGKUAI | Sheet 1 | of 18 |

Change List

| | | | |
|----------|-----------|-----------|-------------|
| VER. | WHO | DATA | Description |
| LMCB_V11 | liangkuai | 2024.8.14 | 第一版设计 |

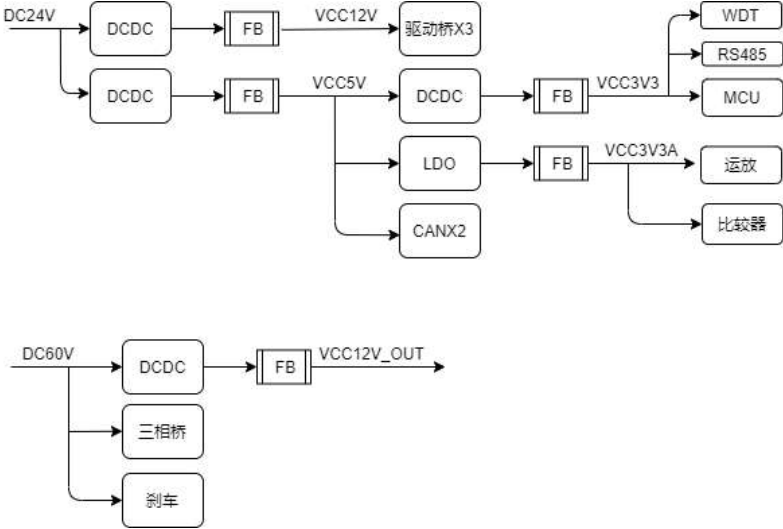
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Block Diagram



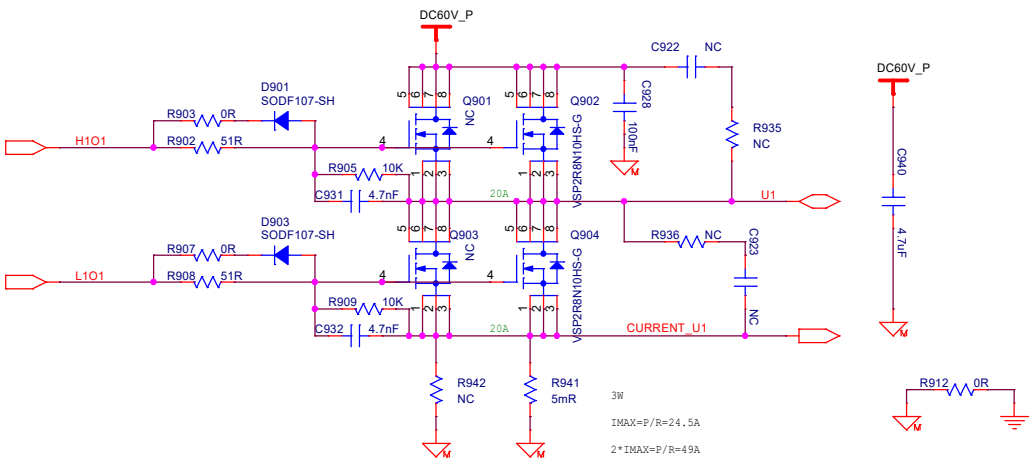
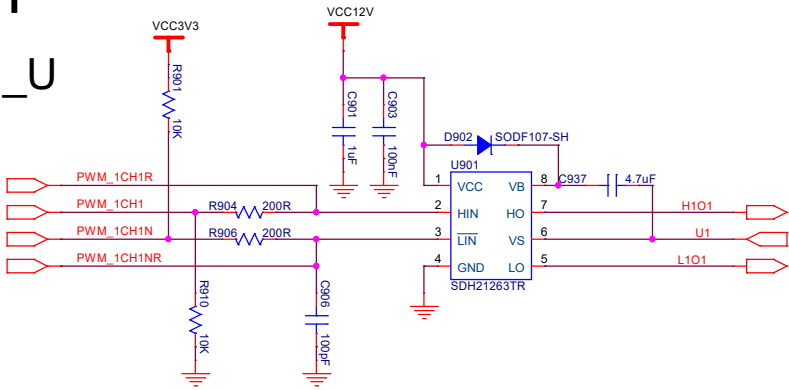
- 1.MCU 驱动电机前 (包括自检), 先打开对外12V电源 (高电平打开), 并检测12V是否正常, 对外12V正常后才能驱动mos
- 2.MCU检测到过流事件, 先让电机自由状态, 在关闭对外12V输出

Power Tree

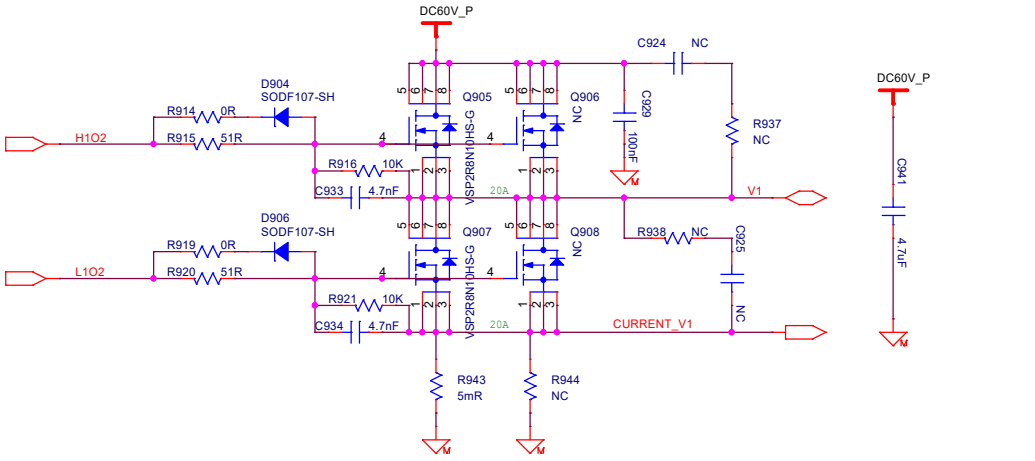
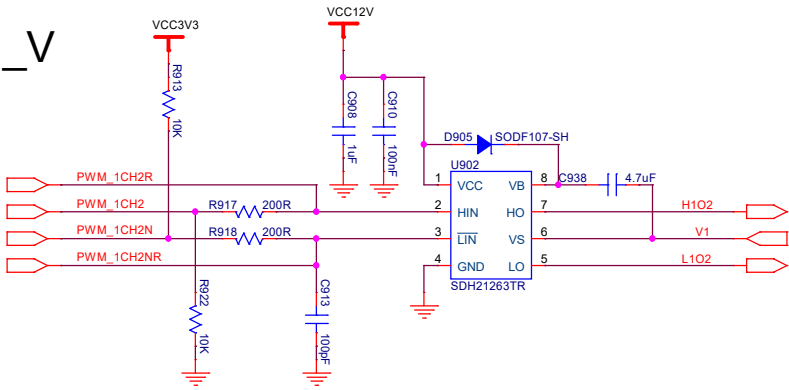


Driver1

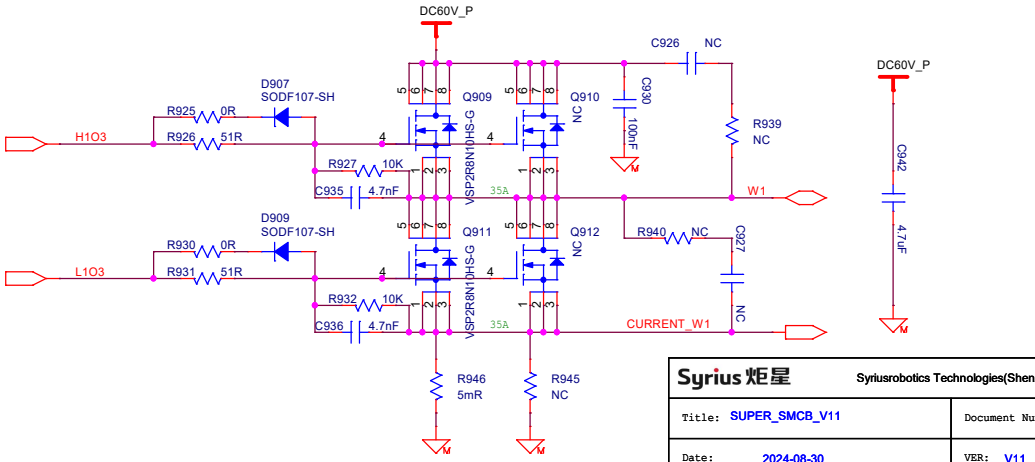
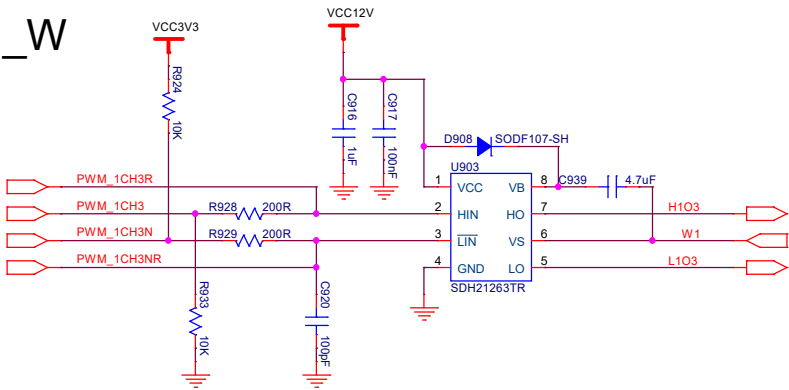
MOTOR1_U



MOTOR1_V



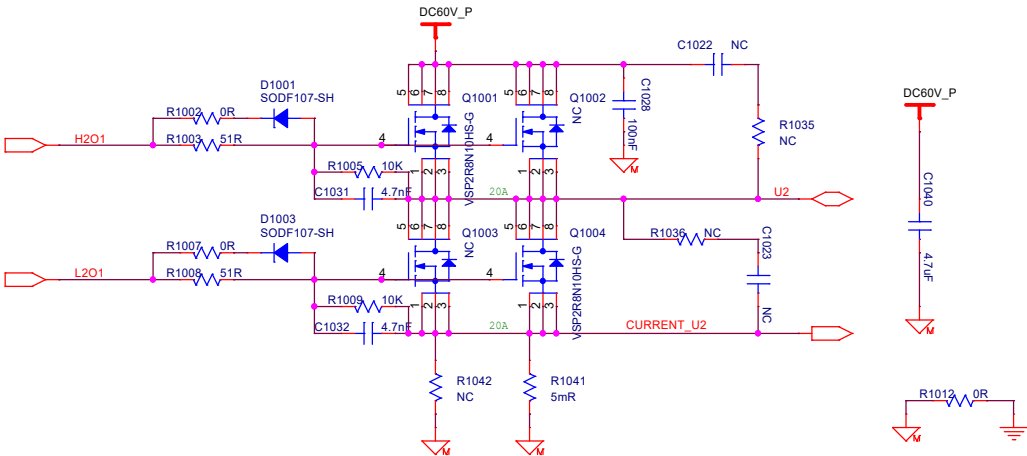
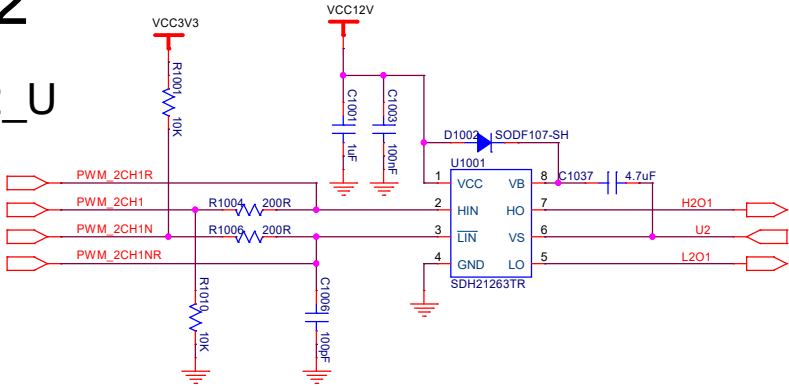
MOTOR1_W



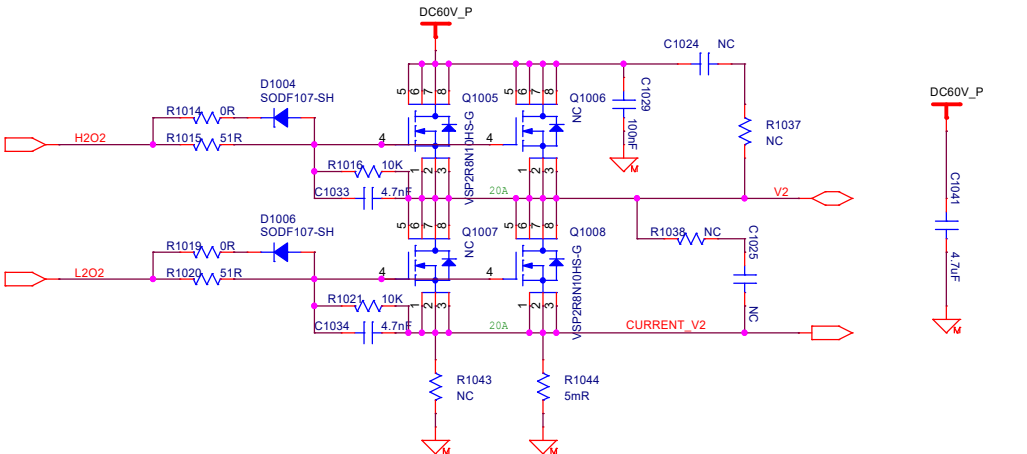
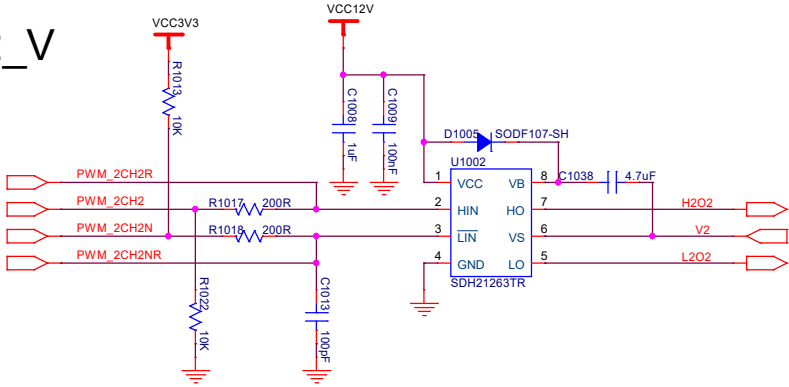
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Driver2

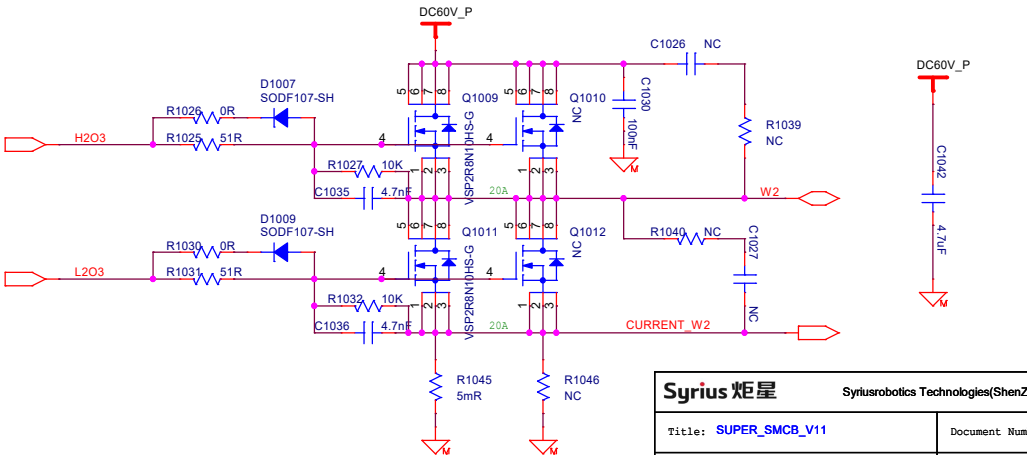
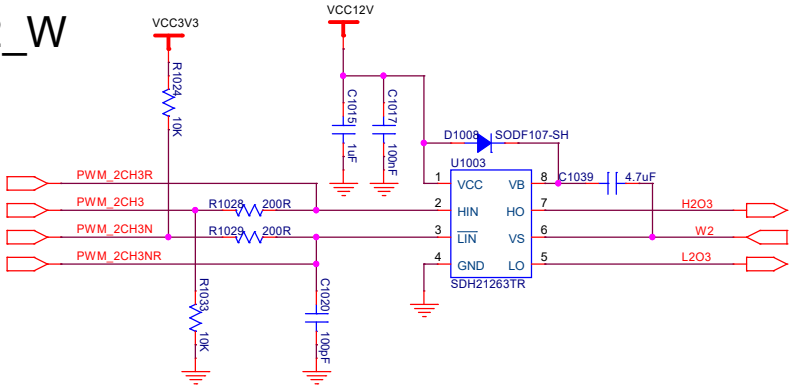
MOTOR2_U



MOTOR2_V



MOTOR2_W

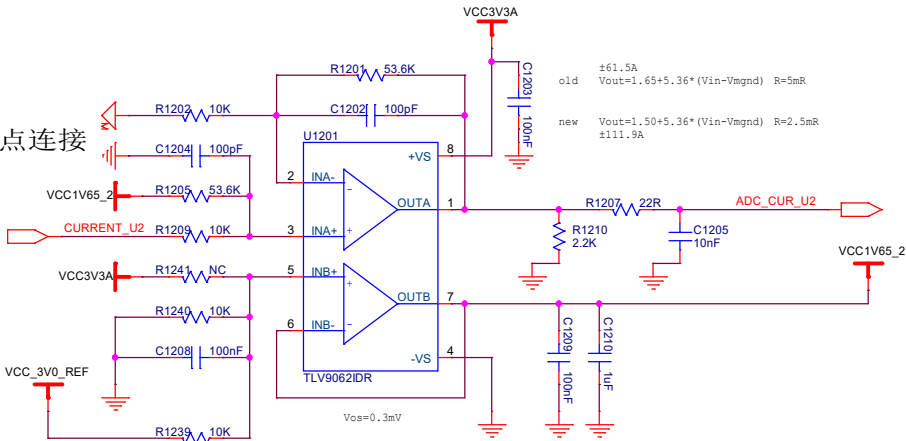


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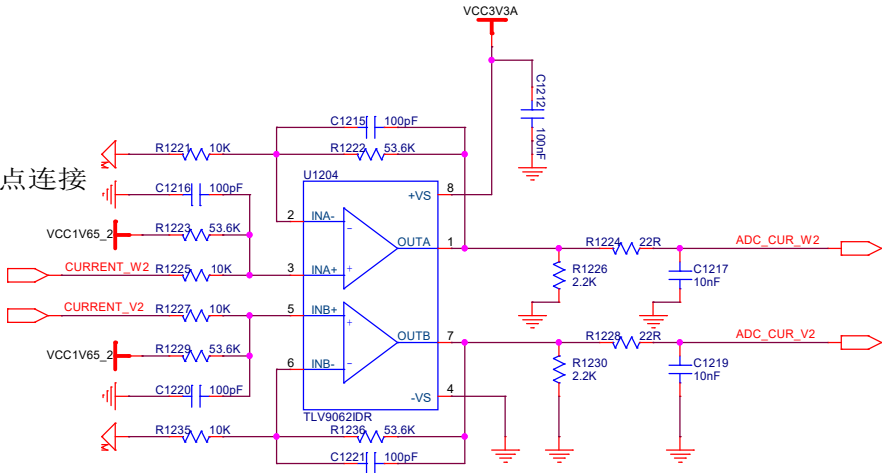
AMP2

OPA

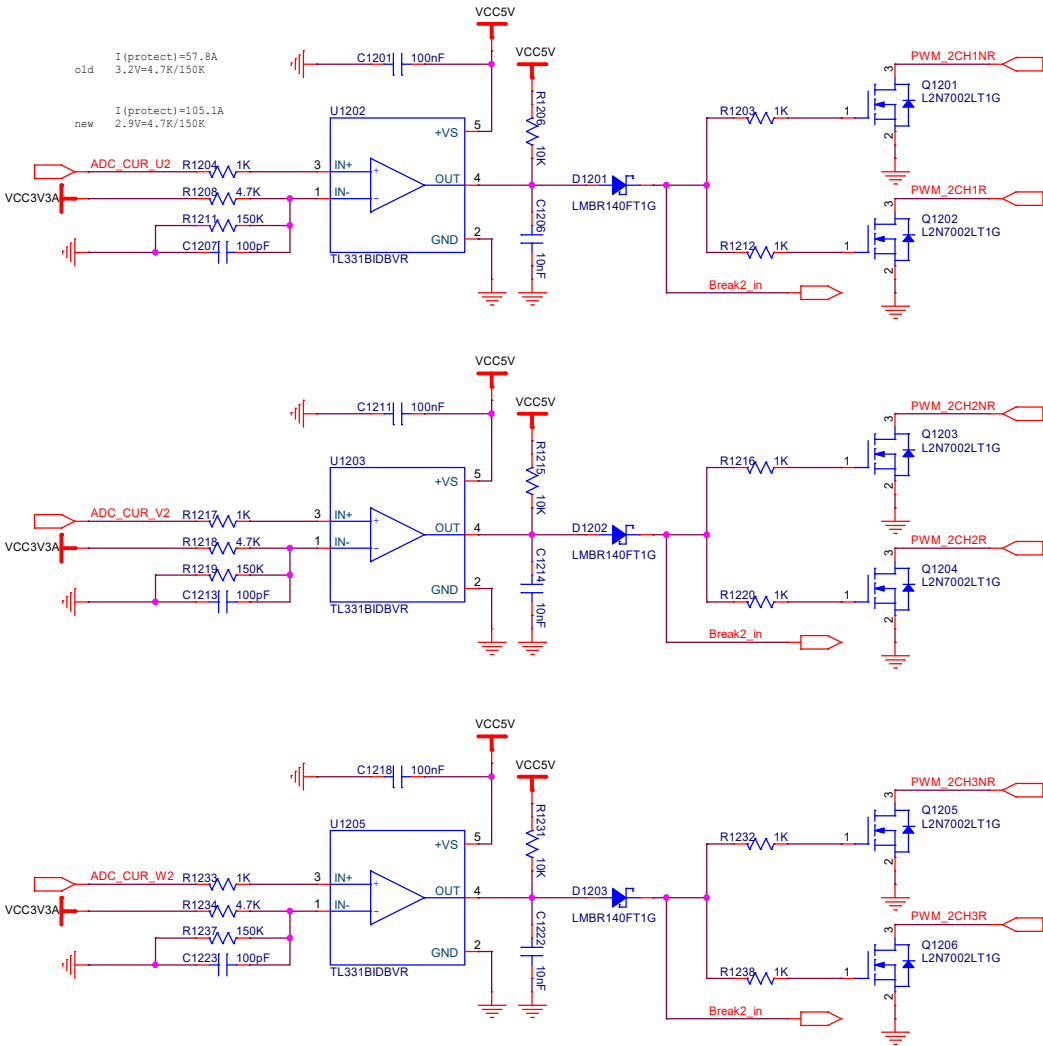
单点连接



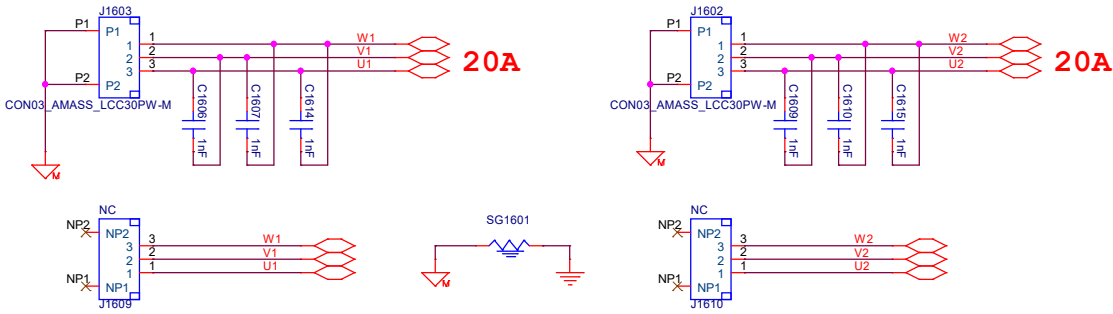
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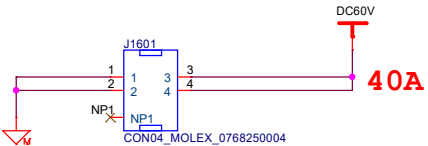
OVP



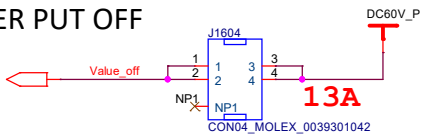
UVW



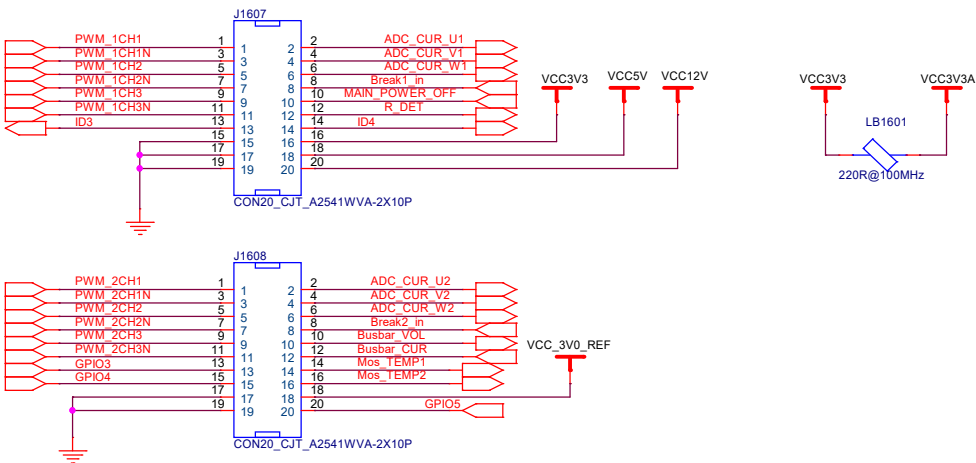
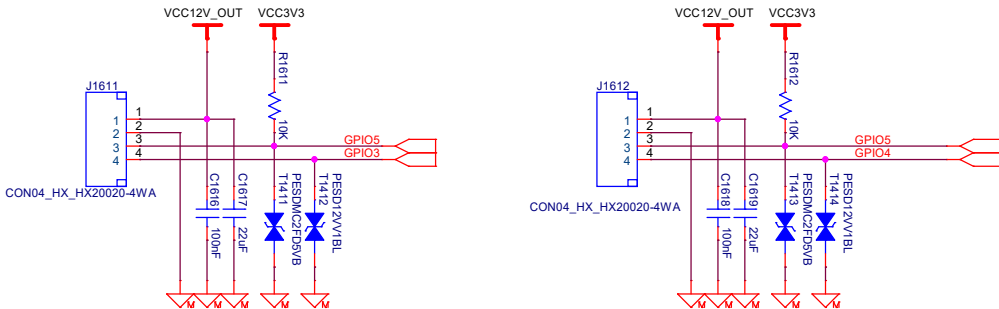
POWER IN



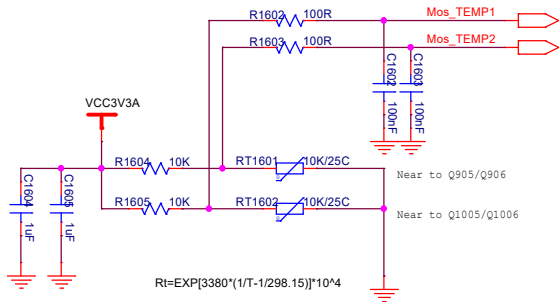
POWER PUT OFF



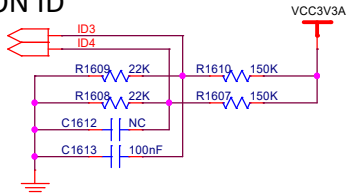
HAND SWITCH



NTC



VERSION ID



V11=ID3 ID4

| | | | | | | | | |
|-----------|----|-------|-------|-------|-------|-------|-------|-------|
| ID01 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | |
| R552/R553 | RD | 0 | 22K | 30K | 100K | 121K | 150K | 200K |
| R548/R549 | RP | NC | 150K | 100K | 200K | 150K | 121K | 100K |
| VOLTAGE | 0 | 0.42V | 0.76V | 1.10V | 1.47V | 1.83V | 2.20V | |

SMCB=ID3 =1

| | | | | | | | | |
|---------|------|------|------|---|---|---|---|-------|
| ID03 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | |
| VERSION | HMCB | SMCB | LMCB | | | | | |
| PROJECT | 重龙 | 超龙 | 梁龙 | | | | | |
| VOLTAGE | 48V | 48V | 24V | | | | | |

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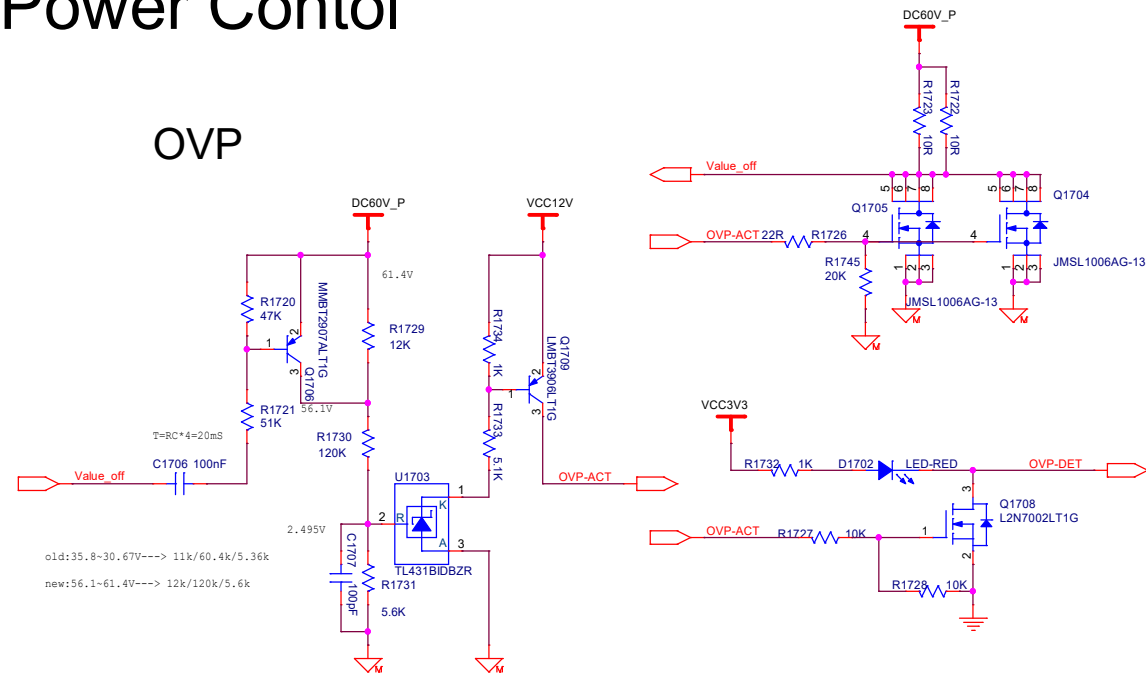
SIZE: A3

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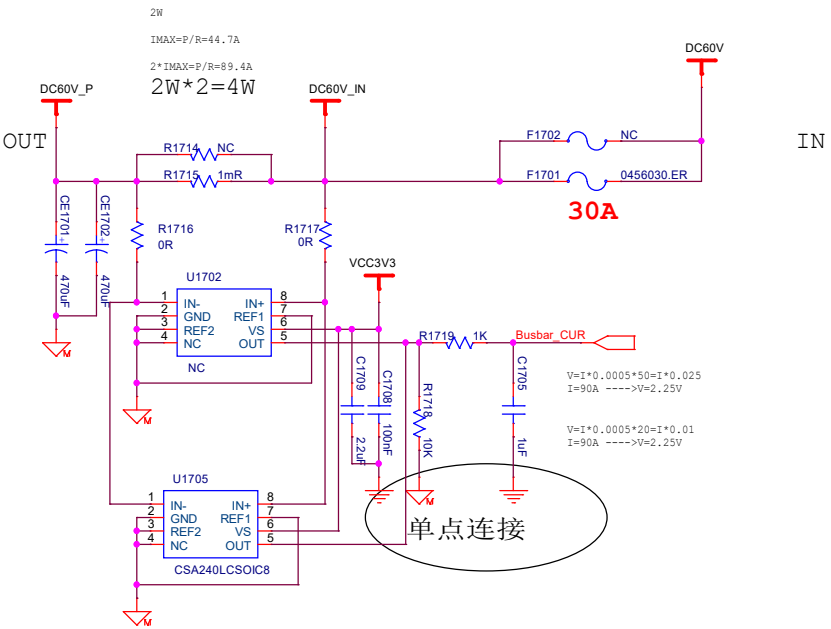
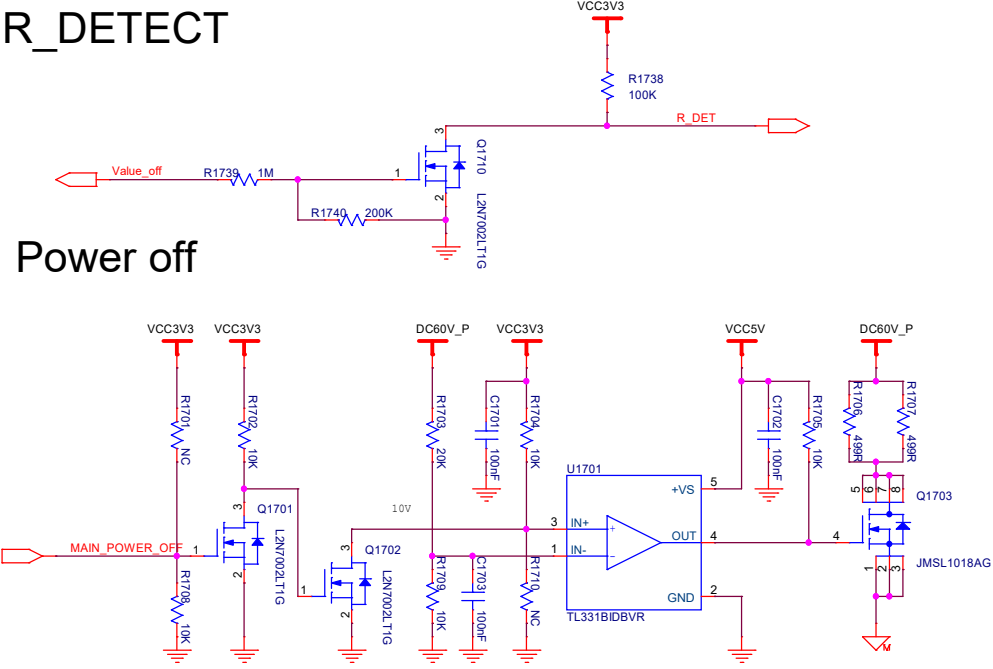
Power Contol

OVP

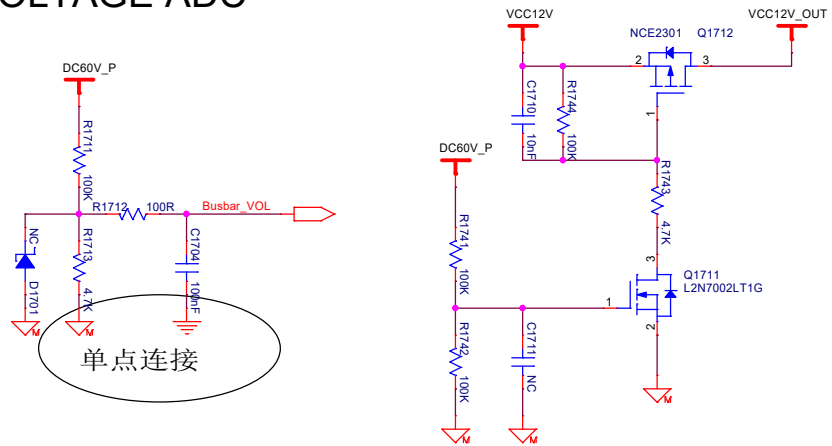


R_DETECT

Power off



VOLTAGE ADC



| | | | |
|---------------------------------------|----------------------------|----------|--|
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