Controller U1

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Native circuitry 1

File: rail-review-1.kicad_sch

Native circuitry 2

File: rail-review-2.kicad_sch

Native circuitry 3

File: rail-review-3.kicad_sch

Native circuitry 4

File: rail-review-4.kicad_sch

Native circuitry 5

File: rail-review-5.kicad_sch

Native circuitry 6

PWR_FLAG

GND

File: rail-review-6.kicad_sch

Native circuitry 7

PWR_FLAG

VG

File: rail-review-7.kicad_sch

Native circuitry 8

PWR_FLAG

+5V

PWR_FLAG

+3V3

File: rail-review-8.kicad_sch

External or diode-isolated supply

External or diode-isolated supply

External or diode-isolated supply

Native circuitry 9

External or diode-isolated supply

External or diode-isolated supply

External or diode-isolated supply

External or diode-isolated supply

External or diode-isolated supply

External or diode-isolated supply

File: rail-review-9.kicad_sch

Native circuitry 10

File: rail-review-10.kicad_sch

Native circuitry 11

File: rail-review-11.kicad_sch

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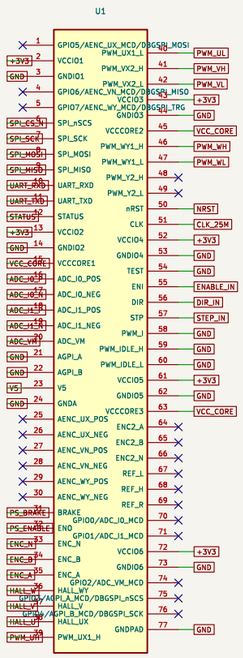
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Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 1/15

Controller U1 / WIP – same-name global labels connect



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Smoothieware / CERN-OHL-S-2.0

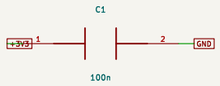
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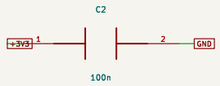
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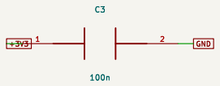
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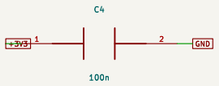
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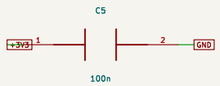
Native circuitry 1 / WIP — same-name global labels connect

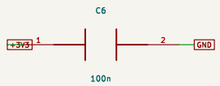


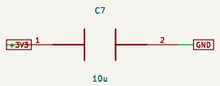


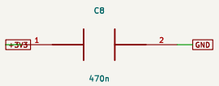


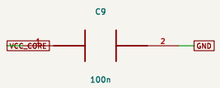


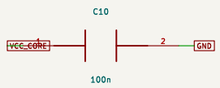


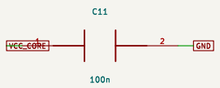




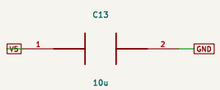


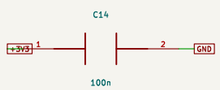


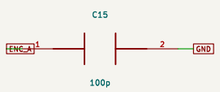


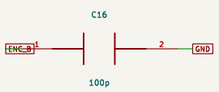












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Smoothieware / CERN-OHL-S-2.0

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KiCad E.D.A. 9.0.8		Id: 3/15

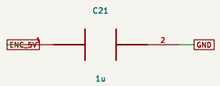
Native circuitry 2 / WIP — same-name global labels connect

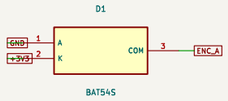


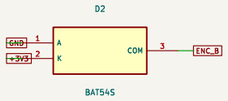


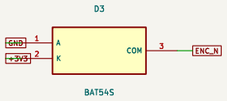


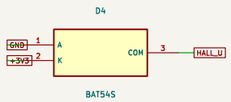


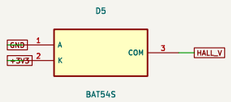


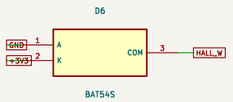


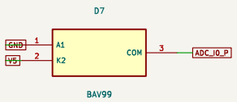


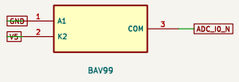


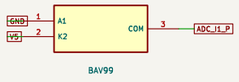


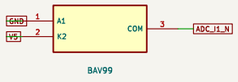


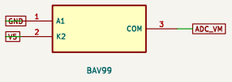












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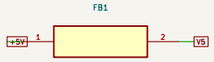
Smoothieware / CERN-OHL-S-2.0

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Native circuitry 3 / WIP — same-name global labels connect



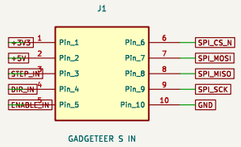


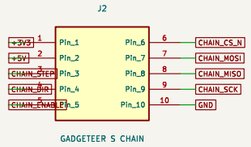


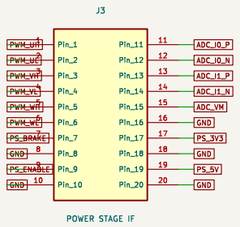


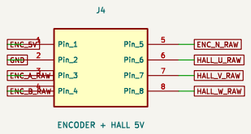


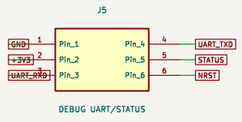


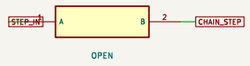


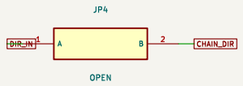


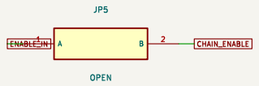


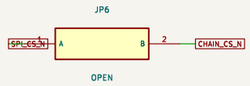


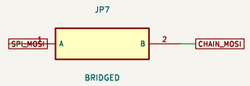












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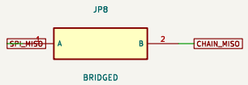
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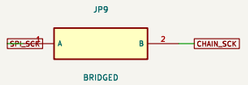
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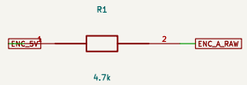
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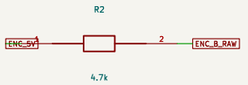
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Native circuitry 4 / WIP — same-name global labels connect



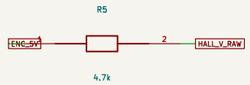






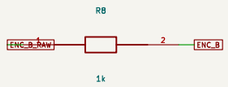


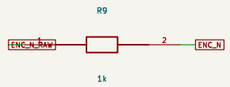


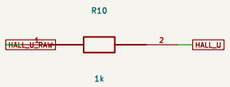






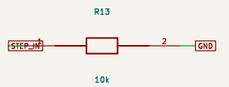


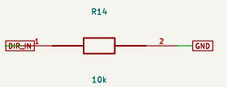












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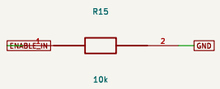
Smoothieware / CERN-OHL-S-2.0

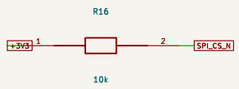
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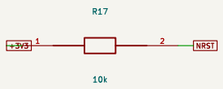
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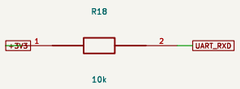
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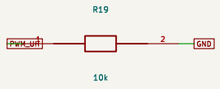
Native circuitry 5 / WIP — same-name global labels connect

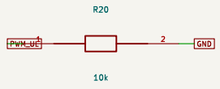


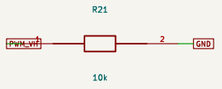


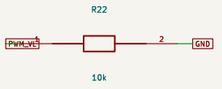


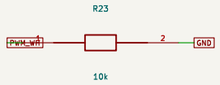


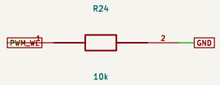


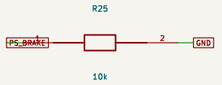


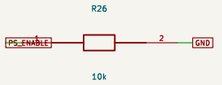


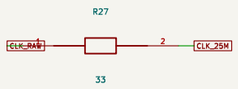


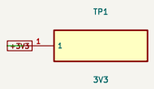


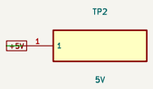


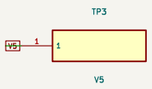












UNFINISHED — NOT FOR FABRICATION

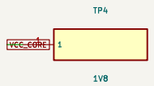
Smoothieware / CERN-OHL-S-2.0

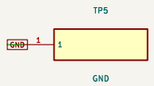
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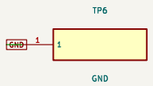
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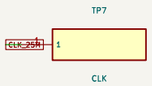
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KiCad E.D.A. 9.0.8		Id: 7/15

Native circuitry 6 / WIP — same-name global labels connect

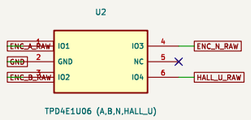


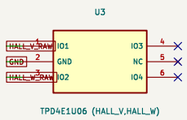


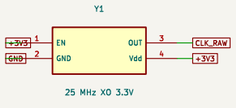














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Smoothieware / CERN-OHL-S-2.0

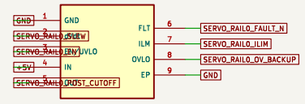
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File: rail-review-6.kicad_sch

Title: Native circuitry 6

Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 8/15

Native circuitry 7 / WIP — same-name global labels connect

U981



TPS259631DDAR AUTO RETRY 350mA LOAD ALLOCATION

R985



1.96k 0.1%

C981



22nF 25V X7R

C982



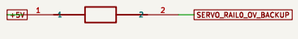
1uF 25V X7R

C983



1uF 25V X7R

R986



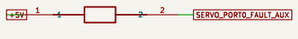
39k 0.1%

R987



10k 0.1%

R988



1k 0.25W

D982



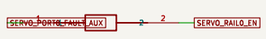
BZX384-B4V7,115

C984



100nF 25V X7R

R989



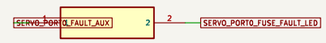
10k 1%

R990



100k 1%

JP981



CUT TO DISABLE FUSE_FAULT PORT0 SERVO PORT0

UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

Sheet: /Native circuitry 7/

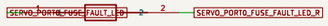
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Title: Native circuitry 7

Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 9/15

Native circuitry 8 / WIP — same-name global labels connect

R991



2.2k 1%

D983



RED EFUSE FAULT

D1031



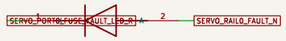
BAT54HGW-Q RP NEGATIVE CLAMP

D1033



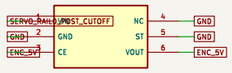
BAT54HGW-Q FAULT AUX NEGATIVE CLAMP

D1034



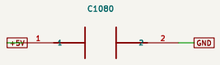
BAT54HGW-Q FAULT LED ANTIPARALLEL

U1280



LM66100DCKR POST CUTOFF RCB

C1080



100nF 25V X7R

UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

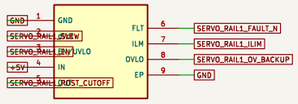
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File: rail-review-8.kicad_sch

Title: Native circuitry 8

Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 10/15

Native circuitry 9 / WIP — same-name global labels connect

U1081



TPS259631DDAR AUTO RETRY 200mA LOAD ALLOCATION

R1085



3.83k 0.1%

C1081



22nF 25V X7R

C1082



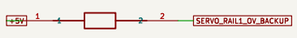
1uF 25V X7R

C1083



1uF 25V X7R

R1086



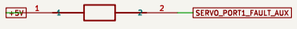
39k 0.1%

R1087



10k 0.1%

R1088



1k 0.25W

D1082



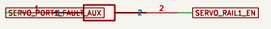
BZX384-B4V7,115

C1084



100nF 25V X7R

R1089



10k 1%

R1090



100k 1%

JP1081



CUT TO DISABLE FUSE_FAULT PORTO SERVO PORT1

R1091



2.2k 1%

D1083



RED EFUSE FAULT

UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

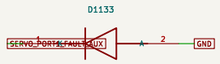
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Title: Native circuitry 9

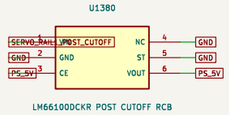
Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 11/15

Native circuitry 10 / WIP — same-name global labels connect

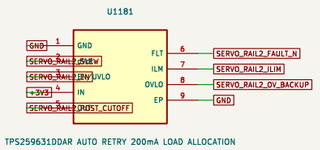












UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

Sheet: /Native circuitry 10/
File: rail-review-10.kicad_sch

Title: Native circuitry 10

Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 12/15

Native circuitry 11 / WIP — same-name global labels connect

R1185



3.83k 0.1%

C1181



22nF 25V X7R

C1182



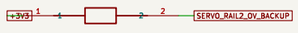
1uF 25V X7R

C1183



1uF 25V X7R

R1186



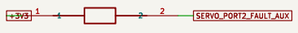
20.4k 0.1%

R1187



10k 0.1%

R1188



1k 0.25W

D1182



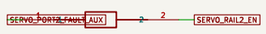
BZX384-B4V7,115

C1184



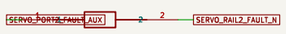
100nF 25V X7R

R1189



10k 1%

R1190



100k 1%

JP1181



CUT TO DISABLE FUSE_FAULT PORT0 SERVO PORT2

R1191



2.2k 1%

D1183



RED EFUSE FAULT

D1231



BAT54HGW-Q RP NEGATIVE CLAMP

D1233



BAT54HGW-Q FAULT AUX NEGATIVE CLAMP

UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

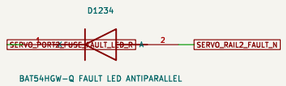
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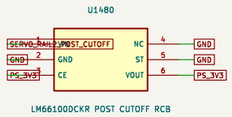
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Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 13/15

Native circuitry 12 / WIP — same-name global labels connect





UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

Sheet: /Native circuitry 12/
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Title: Native circuitry 12

Size: A3	Date:	**Rev: WIP**
KiCad E.D.A. 9.0.8		Id: 14/15

Native circuitry 13 / WIP — same-name global labels connect

UNFINISHED — NOT FOR FABRICATION

Smoothieware / CERN-OHL-S-2.0

Sheet: /Native circuitry 13/

File: rail-review-13.kicad_sch

Title: Native circuitry 13

Size: A3	Date:	**Rev: WIP**
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